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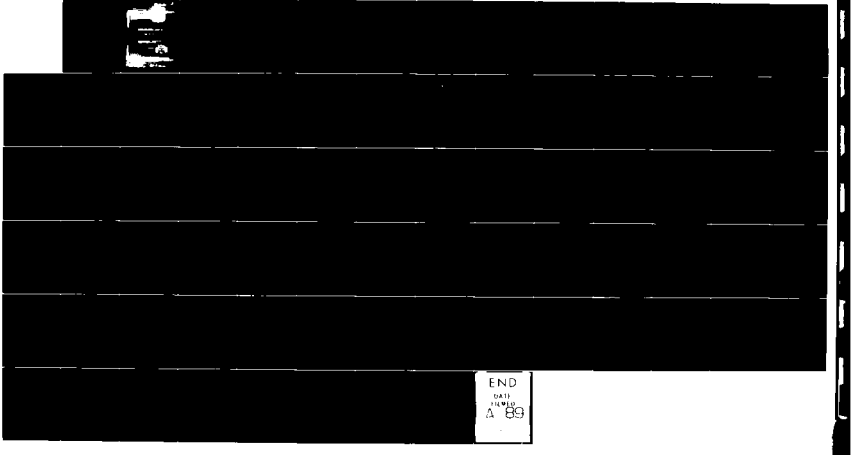

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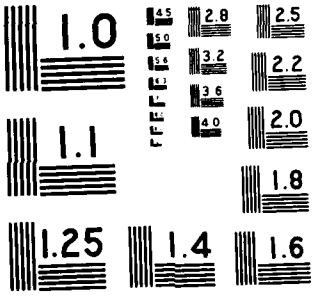
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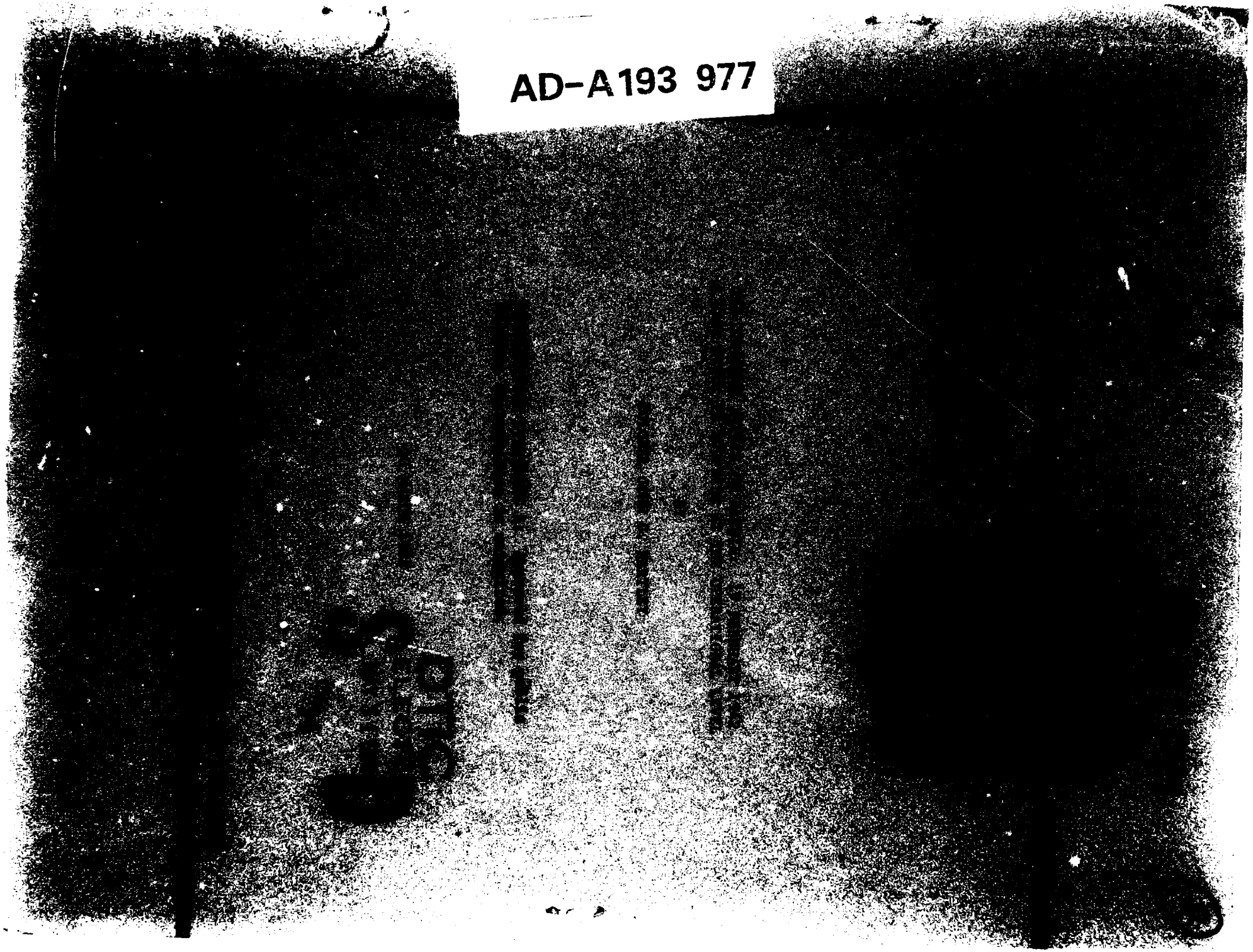

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On 19 February 1942, the northern Australian port city of Darwin was attacked, without warning, by Japanese carrier and land-based aircraft and sustained considerable damage. That the garrison was unprepared is surprising, given the known capability of Japanese air power, its record in the Pacific, and events which preceded the attack.

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Senior Australian officials did anticipate the possibility of an attack on Darwin but assumed that the Netherlands East Indies would need to be occupied by the Japanese first, and that this would only happen after the fall of Singapore. By so doing, these officials failed to assess the importance that Japanese planners placed on eliminating any threat to the occupation of a major objective. Darwin, with its expanding role as a base, was not viewed in this perspective in relation to the capture of Java, Japan's main objective in the Netherlands East Indies. Thus, the failure to prepare for an attack on Darwin was the result of faulty analysis based on an incorrect assessment of Japanese intentions and operational methods. This problem was exacerbated by weaknesses in the collection system and the inability of Darwin's garrison to react to short term warnings.

USAWC MILITARY STUDIES PROGRAM PAPER

THE JAPANESE ATTACK ON DARWIN: 19 FEBRUARY 1942
A CASE STUDY IN SURPRISE AT THE OPERATIONAL LEVEL

AN INDIVIDUAL STUDY PROJECT

by

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30 March 1988

ABSTRACT

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CHAPTER I

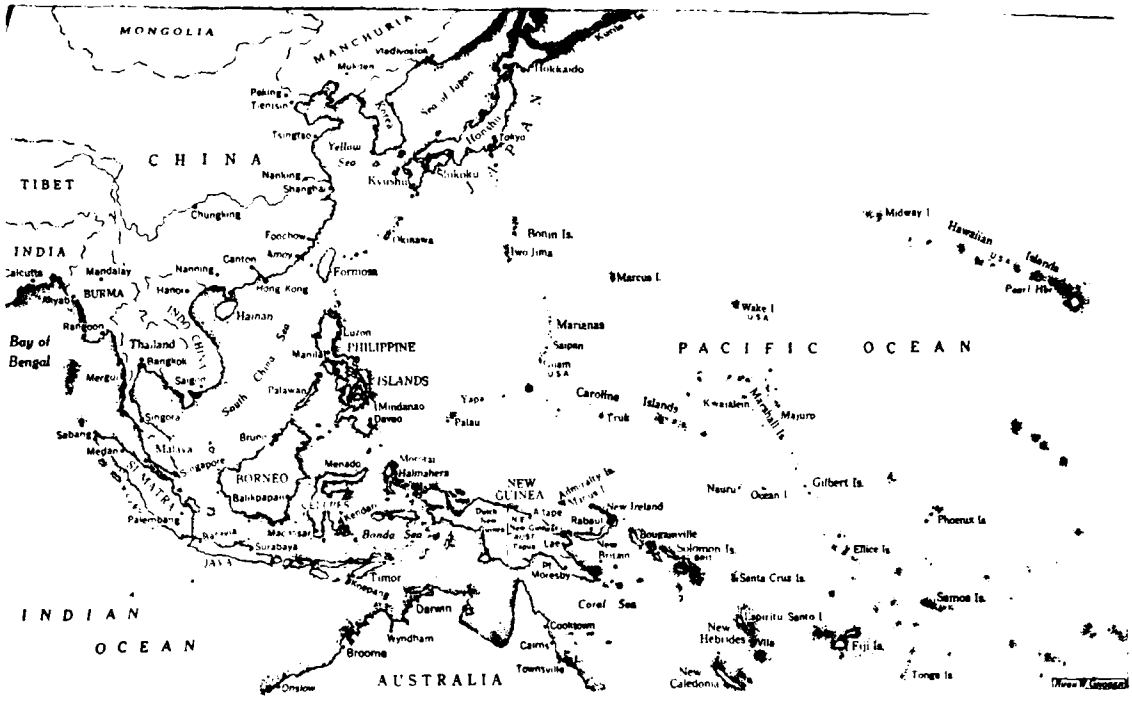
INTRODUCTION

Background

Darwin has been described as "Australia's Pearl Harbor" following the surprise Japanese air raids on 19 February 1942.[1] In mid-morning, 188 carrier-borne aircraft, from four carriers which had taken part in the attack on Oahu,[2] bombed the port and town of Darwin, inflicting the worst military disaster on Australia's territory, with over 240 killed and some 300 injured.[3] Eight ships were sunk and much of the town destroyed; commercial life ceased and the Northern Territory administration moved to Alice Springs, over 1,000 miles to the south. In late morning, a second raid, this time by 54 land-based bombers from Kendari in the Celebes and the island of Ambon, attacked the airbase south of Darwin, destroying numerous aircraft.[4] (See Map 1) And yet, the air attacks were unexpected. That this is so is surprising, given the known capability of Japanese air power, its record in the Pacific and events which had preceded the attacks on Darwin.

The Inevitability of Surprise

Surprise, particularly at the operational and strategic levels, has been systematically examined since Roberta Wohlstetter's 1962 assessment of the Japanese attack on Pearl Harbor.[5] Since then, every major modern conflict has received some attention. Even governments have entered the field with the Agranat Report and the Franke's Commission attempting to determine the degree to which their intelligence communities failed and the causes for such failures.[6]



Map 1: Approaches to Northern Australia
From: McCarthy, South-West Pacific Area First Year, p. 37.

The majority of analysts concludes that strategic surprise is inevitable and that failure at the operational level almost unavoidable.[7] Paradoxically, a number of writers also believe that indications of warning are nearly always present prior to the event.[8] Consequently, much of the literature on the subject seeks to explain the reasons for the failure.

Various reasons are put forward. Klaus Knorr, for instance, lists problems associated with information gathering, especially in closed societies, bureaucratic structures and proclivities, the ambiguity of information, intrinsic intellectual difficulties and predetermined expectations and beliefs.[9] Richard Betts, emphasizing a slightly different perspective, believes that a key cause of failure is related to political and not intelligence issues. He also concludes that the victim's strategic assumptions trigger the critical miscalculations that produce surprise.[10]

Other writers have concentrated on a particular aspect of surprise, including deception,[11] political or diplomatic[12] and technological.[13]

A second group of writers has examined assumptions which psychologically lead to misperception, including ethnocentrism which concentrates on cultural distortions and claims that the reality of the strategic world is inextricably bound up with the manner that the analyst conceives of it.[14] Robert Jervis is a major contributor in this area[15] while other writers, headed by Irving Janis and Graham Allison, examine the impact of dynamics and characteristics of group decisionmaking and bureaucratic politics.[16] Finally, some writers concentrate on individual psychological features[17] and the authoritarian personality.[18]

Even a cursory analysis of the literature on surprise leads to the conclusion that human perceptions will never be accurate; humans perceive the environment as they wish to see it and, as human nature is unlikely to change, the phenomenon of surprise will remain, regardless of how much the subject is studied or how many resources are invested in the intelligence process. Therefore, political and defense policymakers must be prepared to operate on the assumption that surprise is inevitable.

Nature of Surprise

Surprise, other than at a tactical level, can be classified as either strategic or operational. Examples of the former are those which occur when one state makes a strategic decision to invade another at the outset of a war which almost always results in the attack achieving surprise. Recent examples include the Argentine capture of the Falkland Islands, the 1973 Egyptian and Syrian attack on Israel, and the 1967 Israeli attack on Egypt.

By definition, however, operational surprise only occurs after a war has been declared and is clearly linked to a particular campaign or battle. Here

the success rate of detecting a surprise attack is somewhat higher than for the strategic level but the probability for failing to do so is still great. Examples where operational surprise was attempted and failed include Midway, Alam Halfa and Kursk.[19]

Darwin is an example of operational surprise; war had been in progress for several weeks, Australian troops had been engaged with the Japanese in Ambon and Rabaul, the battle lines had drawn steadily closer to northern Australia, Japanese reconnaissance elements had been active in the Darwin area, and allied ships and aircraft had been engaged within 300 miles of the port.

Scope of Paper

This paper examines the background to the attacks on Darwin on 19 February 1942 and seeks to determine why the town and garrison did not receive sufficient warning. In so doing, it will attempt to determine what expectations, if any, existed at national level and within the Darwin area of a Japanese attack, the adequacy of information to forecast and identify such an attack and the reasons why a correct assessment was not forthcoming. Finally, it will attempt to assess whether the attacks conform with the observations of most analysts that there is only a small probability of avoiding surprise.

No comprehensive study of these issues, as they related to Darwin, has been attempted before. Official war histories restrict their reporting to describing the event and the results of the attacks. The subsequent Commission of Enquiry, which was established by the Australian government to examine a number of operational and administrative issues, was tasked to assess why the garrison failed to receive any warning. Beyond a general

conclusion, the Enquiry's report also failed to provide an adequate reason why the Japanese achieved surprise.[20] Likewise, Douglas Lockwood is unable to account for the lack of warning, despite his comprehensive coverage of, and research into the activities in Darwin on 19 February.

With the release of official documents, not previously available to Lockwood and the Court of Enquiry, some clarification of official attitudes and assessments is possible. Nevertheless, the reasons why commanders and their intelligence staffs in Darwin and their national counterparts failed to consider the possibility of a surprise attack cannot be fully determined without interviewing them or having access to private documents, assuming they exist. This has not been possible and, in view of the time since the attacks, few key officials are likely to be available for interviews.

ENDNOTES

1. Douglas Lockwood, Australia's Pearl Harbour (Melbourne: Cassell, 1946).

2. Apart from the aircraft carriers, the four escorting cruisers and nine destroyers, the commanding admiral, the air attack leader and the chief planner were identical in both operations. Ibid., pp. xiii, 4.

3. Precise figures vary. The Commission of Enquiry lists 228 dead in Darwin with 15 additional deaths on the Don Isidro, the Florence Dee and the Catalina flying boat destroyed between Darwin and Bathurst Island. (It also estimates between 300 and 400 wounded.) "Commission of Inquiry Concerning the Circumstances Connected with the Attack made by Japanese Aircraft at Darwin on 19th February, 1942: Reports by Commissioner (Mr. Justice Lowe), together with Observations by the Departments of the Navy, Army, Air and Interior," p. 9. Australian Archives ACT (henceforth referred to as AAA) CRS A431 Item 49/687). Lockwood (p. 46) claims 243 killed and over 330 wounded. The Royal Australian Air Force official war history assesses the death toll as 238 of whom at least 157 died in ships, 14 in town and 21 on the wharf. Fourteen Air Force servicemen (seven RAAF and seven USAAF) and two soldiers were also killed. Douglas Gillson, Royal Australian Air Force 1939-1942 (Canberra: Australian War Memorial, 1962), pp. 430-1.

4. Eight ships were sunk in Darwin Harbor: the United States destroyer Peary, two RAN ships, two U.S. transports, a British tanker and two Australian coastal traders. In the same action, but outside the harbor, the United States supply ships Don Isidro was sunk and Florence Dee was set on fire and beached. Fourteen ships were also damaged, including the Australian hospital

ship Manunda and seven RAN ships. Lockwood, pp. 44-7. Twenty aircraft were destroyed (Commission of Enquiry, p. 8). By comparison, the Japanese sank 18 ships, destroyed 64 aircraft and killed 2,000 people at Pearl Harbor. Lockwood, p. 46.

5. Roberta Wohlstetter, Pearl Harbor: Warning and Decision (Stanford: Stanford University Press, 1962). Another pioneer in this area is Klaus Knorr, "Failures in National Intelligence Estimates: The Case of the Cuban Missiles." World Politics, 16 (April 1964), pp. 455-67.

6. State of Israel, The Agranat Report (Tel Aviv: Am Oved Hebrew, 1975). Lord Franks, Falkland Islands Review: Report of a Committee of Privy Counselors (London: H. M. Stationery Office, January 1983).

7. For example, Michael I. Handel, "Perception, Deception and Surprise: The Case of the Yom Kippur War," Jerusalem Papers on Peace Problems, No. 19 (Jerusalem: Hebrew University, 1976). Klaus Knorr, "Strategic Intelligence: Problems and Remedies," in Lawrence Martin (ed.), Strategic Thought in the Nuclear Age (Baltimore, MD: John Hopkins University Press, 1979).

8. For example, Richard Betts, "Surprise Despite Warning," Political Science Quarterly, Vol. 95, No. 4 (Winter 1980-81), pp. 551-72. A recent exception to this belief is Ariel Levite, Intelligence and Strategic Surprises (Ann Arbor, MI: University Microfilms International, 1983).

9. Klaus Knorr, "Threat Perception," in ed. by Klaus Knorr Historical Dimensions of National Security Problems (Lawrence, Kansas: Allen, 1976), p. 97.

10. Richard K. Betts, Surprise Attack: Lessons for Defence Planning (Washington: The Brookings Institution, 1982), pp. 8-9.

11. Michael I. Handel, ed., Strategic and Operational Deception in the Second World War (London: Frank Cass, 1987).

12. Michael I. Handel, "The Politics of Intelligence," Intelligence and National Security, Vol. 2, No. 4 (October 1987), pp. 5-46.

13. Michael I. Handel, "Technological Surprise in War," Intelligence and National Security, Vol. 2, No. 1 (January 1987), pp. 1-53.

14. Geoffrey K. Roberts, A Dictionary of Political Analysis (New York: St. Martin's Press, 1971), p. 76. See also Ken Booth, Strategy and Ethnocentrism (London: Groom Helm, 1979).

15. Robert Jervis, Perception and Misperception in International Politics (Princeton, NJ: Princeton University Press, 1959).

16. Irving L. Janis and Leon Mann, Decision Making: A Psychological Analysis of Conflict, Choice and Commitment (New York: The Free Press, 1977), pp. 57-8.

17. Psychological features include cognitive dissonance and intolerance of ambiguity. The former, defined by Leon Festinger, is concerned with ways in which a decisionmaker tries to increase his comfort with the decisions he has taken. The latter is the idea that individuals are unable to recognize the contradictory characteristics of a situation and are reluctant to suspend judgement while examining evidence. Leon Festinger, A Theory of Cognitive Dissonance (Stanford, California: Stanford University Press, 1957).

18. T. W. Adarno, et.al., The Authoritarian Personality (New York: Harper, 1950).

19. In the case of Midway, Ariel Levite, (pp. 137-97) has recently examined this issue. Alam Halfa, the late August 1942 Gereman attack in the Western Desert, failed to achieve surprise because the British were able to determine Rommel's intentions through ultra intercepts. F. H. Hinsley, E. E. Thomas, C. F. G. Ransom and R. C. Knight, British Intelligence in the Second World War: Its Influences on Strategy and Operations, Vol. II (New York: Cambridge University Press, 1981), pp. 409-17. With regard to Kursk, British Ultra intercepts provided the Russians adequate warning of German deception measures. (Ibid., pp. 620-627.)

20. "Commission of Enquiry," pp. 9-10.

CHAPTER II

AUSTRALIAN ASSESSMENT OF JAPANESE THREAT

Pre-War Perceptions

The specter of a Japanese threat to Australia had been present from the time of the Japanese victory over Russia in 1905.[1] While the Anglo-Japanese alliance provided some security in the First World War, when the war ended and the treaty expired, Japanese naval strength had grown considerably. Nevertheless, faced with the problems of national development and the depression, Australian governments tended to rely on the advice of their more experienced British counterparts for guidance in international relations, including strategy and defense. Therefore, while the presence of a Japanese threat continued to impress itself on Australian policymakers, public apathy and government indifference were rationalized by the intended development of a British base in Singapore and the perceived willingness of the Royal Navy to deploy a sizeable fleet there in time of crisis.[2] Thus the Australian government "failed to face the realities of the menacing international situation which developed rapidly in the second half of the nineteen thirties."[3]

An examination of official documents in the period before the Japanese occupation of Indo-China supports this assessment. In mid-1936, for instance, the Minister for Defense and Foreign Affairs was prepared to state in a public address that:

> The termination of the Naval Limitation Treaties, the frontier clashes between Soviet Russia and Japan, the statement that the Soviet's membership of the League is attributed to the fear of a German-Japanese alliance and a desire to reinsure herself under the Covenant against a simultaneous attack in the West and the East, and the developments in Northern China, reflect the unstable situation which has developed in the Pacific Ocean. The U.S.A. Secretary of State has stated that all of the

> treaties entered into at the Washington Conference were interrelated and interdependent. The effects of the termination of the Washington Naval Treaty and the withdrawal of Japan from the London Naval Conference remain to be disclosed by time.[4]

Two years later, the situation had barely changed. The Defense Committee minutes for the 16 August 1938 meeting show the Chief of the General Staff, Major General J. D. Lavarack, concerned over the "increased pace of rearmament and general preparation for war on the part of Japan." He expressed the belief that

> a review of the international and general military situation now would lead to the conclusion that preparation for defense against a scale of attack somewhat higher than now visualized, though in no way approaching the maximum, would be necessary.

His service counterparts in the Navy and Air Force, Vice Admiral Sir Ragnar Colvin and Air Vice Marshal R. Williams, however,

> considered that other factors influencing the international situation counterbalanced those put forward by the Chief of the General Staff and instanced the rapid increase of British re-armament and the fact that Japan is now heavily involved in China. They were unable to agree that the situation had changed so radically as to call for a re-survey of the situation or for any drastic change in government policy.[5]

By early 1941, Australian attitudes towards the Japanese threat were changing.[6] On 5 February, the Leader of the Opposition expressed the view that Japan's policy was one of opportunism and that an attack on Australia should not be discounted.[7] In the next week, London announced that "the Japanese may already have decided to push southward even if this means war."[8] The Australian minister in Tokyo expressed a similar opinion.[9] Meanwhile, the Australian Chiefs of Staff had concluded in an appreciation that Japan was unlikely to invade Australia before Malaya and the Netherlands East Indies (NEI) were captured and "the possibility of American intervention

from Hawaii" negated.[10] Japan's intention to strike south was subsequently confirmed, after Germany's attack on Russia, by the United States, following the intercept of Japanese diplomatic messages.[11]

To Australian defense planners, this information, together with that from other sources, revealed Japan's increasing preparations for war. In October, the recently formed Combined Operational Intelligence Centre (COIC) reported that Japan's preparation for war was almost complete and that the Navy was fully mobilized. On 1 December, it reported that "Japan is now ready to strike in any direction from Indochina at any moment."[12]

The importance of Darwin to operations in the Indies and to the subsequent defense of Australia was soon perceived by Australians. Following Pearl Harbor and the Japanese attacks on the Philippines and Malaya, the Australian War Cabinet reviewed the circumstances in which Australia now found itself. At meetings on 8, 9, 11 and 12 December, the Australian Chiefs of Staff provided advice based on an assessment of the defense of Australia and those areas for which Australia had accepted responsibility in prewar discussions with Britain, Holland and New Zealand.[13]

This assessment believed that Japan had two main courses of action: to move south in a phased manner so that the outcome of operations in Malaya, and possibly the NEI, would depend on whether Australia would have to defend her territories; or, to move directly to Australia by way of the islands to the north and northeast.[14] (See Map 1)

On 11 December, the Chiefs of Staff briefed the War Cabinet as follows:

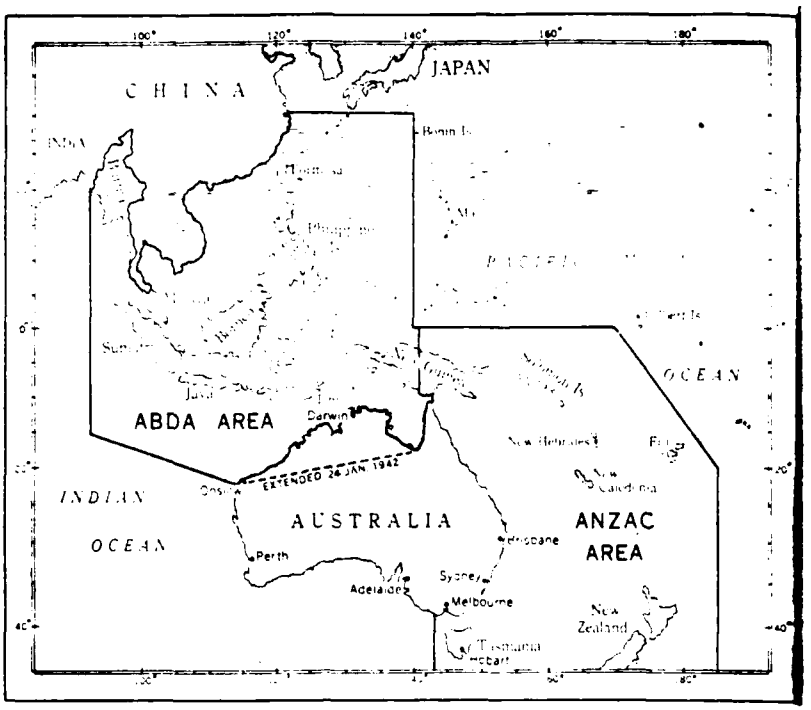
> A probable initial Japanese course of action would be an attempt to occupy New Guinea (Rabaul), Papua (Port Moresby) and New Caledonia (Noumea) from the Japanese bases in the Carolines and Marshall Islands. An attack on Rabaul which is within range of land-based aircraft operating from the Japanese bases is a likely first step,

> but the simultaneous attack on some or all of these places and any of the outer islands in the Australian sphere cannot be excluded.

The briefing continued that "Darwin is the only main fleet operating base for Allied naval forces operating in the eastern end of the Malay Barrier," and assessed that "an attack by bombardment squadron or carrier-borne aircraft is a strong possibility." The capture of Timor would greatly facilitate an air attack on Darwin although the report stated that the size of the Darwin garrison would make seaborne raids unlikely at the time. Nevertheless,the capture of Singapore and the NEI and the defeat of Allied naval forces would enable the Japanese to invade Australia. Based on these assessments, the Chiefs of Staff recommended that Rabaul, Port Moresby, New Caledonia and Timor be garrisoned by at least a brigade group, supported by anti-air and coastal defense units. They also recommended that Darwin be retained as a fleet operating base.[15]

Britain and the United States, however, were undoubtedly more concerned with the security of Malaya and the Philippines. On 11 December, for instance, in response to Australia's Prime Minister Curtin, Britain indicated "that events were moving too quickly for a general review", but that there did not appear to be "any immediate large-scale threat to Australia."[16] Similarly, by early January, when the American, British, Dutch, Australian (ABDA) Command was formed, Australian representation was required to ensure that Darwin was included within the command, despite the fact that it was scheduled to play a major role in support of operations further north.[17] (See Map 2)

Wavell, Commander ABDA Command, was tasked "not only in the immediate future to maintain as many key positions as possible but to take offensive



Map 2: ABDA Command Area

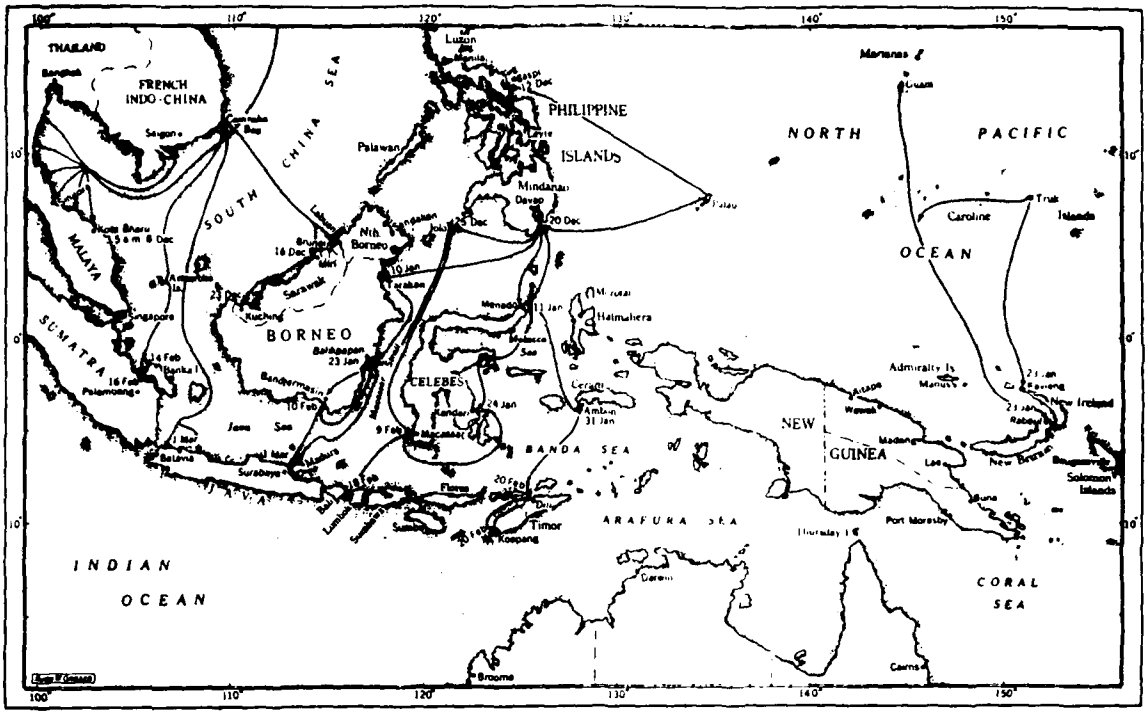
action at the earliest opportunity and ultimately to conduct an all-out offensive against Japan." He was directed by the Combined Chiefs of Staff to hold the island chain Malaya-Sumatra-Java-Northern Australia, to defend Burma and Australia as "essential support positions," to reestablish communications with the Philippines through the NEI and to maintain essential communications generally.[18] Although Dutch and American members of his staff considered it essential to hold the forward air bases on the general line Ambon-Celebes-central Sumatra, he decided that the defensive effort should be further back on the Darwin-Timor-Java-southern Sumatra line.[19] He therefore sought to contain Japanese advances in Malaya, to prepare Singapore for defense and to strike, by means of air and naval forces, as far forward as possible. (See Map 1)

Japanese pressure continued, however. By late January, the Australian Chiefs of Staff, who had previously believed that Australia would not be subject to a major attack while Malaya and the Malay Barrier were held, now changed their assessment. Instead, it could not be assumed that Malaya and the NEI would hold or that the American Pacific Fleet would secure supremacy in the Pacific. The Australian Government, therefore, was advised to prepare for a large scale attack.[20] As if to give emphasis to this assessment, Ambon was attacked on 30 January.

By early February, Darwin's security as an operational base was gravely in question.[21] More than a month earlier, the Australian War Cabinet had decided to evacuate most of the women, children, aged people and invalids from the town. By this time, too, concern was being expressed by other than Australian voices. The Chief of the United States Naval Staff, Admiral King, surveying this phase of the war wrote "Darwin, not entirely suitable from the beginning, was becoming untenable."[22] Undoubtedly, this remark referred not only to the inadequacy of Darwin as a base, because of its size and ship handling capacity, but also to its increasing vulnerability to attack.

Meanwhile, Japanese forces advanced down the Malay Peninsula, landed in Borneo, the Celebes and Ambon, occupied most of the Philippines and overran Southern Burma. Singapore fell on 15 February. Thus, the Malayan barrier collapsed, and allied naval forces, which had been assembled to hold it,would shortly be beaten.[23] On 16 February, the Australian Prime Minister described the fall of Singapore as "Australia's Dunkirk" and claimed that the event "opens the battle for Australia."[24] (See Map 3)

To give substance to his rhetoric, on 17 February Mr. Curtin asked his British counterpart to divert the remaining Australian Imperial Force units to Australia and that Darwin should be the first place to be reinforced.[25]



Map 3: Japanese Progress in the Western Pacific:
8 December 1941 to 1 March 1942

From: Wigmore, The Japanese Thrust, p. 393.

Likewise, when the Australian Chief of Air Staff told the War Cabinet that the first six squadrons of American fighters to be assembled in Australia were to go to ABDA Command, the War Cabinet decided to ask Wavell to deploy at least some aircraft for the immediate defense of Darwin.[26]

Japanese Intentions

By this time, Japanese operational methods were becoming clearer. Air, sea and land forces were coordinated under a unified command with local air and sea superiority being achieved prior to each new phase. After concentrating a strong task force at an advanced base, land-based aircraft would overcome the consistently inferior allied air opposition at the next

point of attack. The surface ships would neutralize coastal defenses and cover the landing of troops from transports, usually shallow-draft ships, which were capable of moving close to the shore. As soon as the area was under control, the airfield would be repaired or improved, land-based aircraft would arrive and cycle be repeated.[27] Australian authorities, therefore, had every right to concern themselves, particularly with the capture of the airfield at Ambon which placed Darwin within range of land-based aircraft. But what of Japanese intentions?

The Japanese Navy General Staff had considered the viability of an attack on Darwin shortly after Pearl Harbor. Subsequently, the Combined Fleet Staff, led by Admiral Isoruku Yamamoto, became concerned with the possible allied use of Northwest Australia to impede the Japanese seizure of the NEI.[28] As a result, he proposed an amphibious attack on Darwin. This was denied by the Navy General Staff and the Army. Combined Fleet, therefore, decided on the best alternative; to wreck base installations in the area.[29]

The first direct suggestion was made by Rear Admiral Yamaguchi, Commander Carrier Division 2, on 20 January when he was directed to attack Rabaul.[30] There was still doubt, however, as to whether Darwin or Ceylon should be attacked first, and it was not until 31 January that permission was given. To Yamaguchi's chagrin, however, the attack would be by Carrier Divisions 1 and 2, thus ensuring that overall command would go to Admiral Chuichi Nagumo.[31] The force departed Palau in early February, and Order No. 92, the initiating instruction reads, in part, as follows:

> Owing to our air attacks at the beginning of February, the enemy, with its main base in Java, lost most of its naval and air strength. It is highly probable that they are planning escape to Australia, India and South Africa. It is also probable that the naval strength of Britain, the United States, the Netherlands and Australia will appear in the Eastern Indian Ocean to pick them up. It appears that a part of the enemy strength is already taking refuge

> in the vicinity of Port Darwin. Intelligence shows that part of the U.S. air reinforcements, together with British and Australian forces, are based there.
>
> At an opportune time the carrier task forces will conduct mobile warfare, first in the Arafura Sea and next in the Indian Ocean, endeavoring to annihilate the enemy strength in the Port Darwin area, and to intercept and destroy enemy naval and transport fleets, at the same time attacking enemy strength in the Java area from behind.
>
> For the surprise attack on Port Darwin on February 19, the task force will advance to the Arafura Sea. After the surprise attack it will return to Staring Bay (in the Celebes) for supply.[32]

To the allies, the contents of this document would remain a secret unless they were broadcast and subsequently intercepted and deciphered by an allied signals intelligence organization or captured or acquired through clandestine means. As detailed in Chapter IV, this did not happen. Therefore, as is usually the case in war, the allies would have to rely on other, less obvious, but related activities to determine Japanese intentions. Did these "indicators" show themselves?

Japanese Interest in Darwin

The Japanese presence in the area had been brought home forcefully to the people of Darwin in the six weeks prior to the attack. As early as 1 January, a Japanese submarine had been seen crossing the entrance to the harbor. Further sightings occurred on 3, 11 and 16 January and, on 20 January, an Australian corvette, in company with other allied warships, sank a submarine some 50 miles northwest of Darwin.[33]

From late January, there were numerous sightings of Japanese aircraft, particularly in the sea gap between Darwin and Timor. On 30 January, the Qantas flying boat Corio was shot down near Timor and an Australian warship and a British tanker were bombed some 70 miles west of Bathurst Island. On

the same day, Darwin experienced a 90-minute air raid alert, following intense enemy air activity over Timor. On 8 February, a U.S. Liberator was attacked 200 miles northwest of Darwin by three fighters and, over the next week, on at least three occasions, single aircraft conducted high level reconnaissance over Darwin.[34]

Submarine sightings and incidents by individual aircraft did not, however, constitute an immediate, clearly-identifiable threat. Nevertheless, as the center of Japanese activity moved south, Japanese offensive capability, in relation to Darwin, increased significantly.

Japanese Operations Prior to the Attack on Darwin

On 10 January, two Japanese landing forces were detected leaving Davao in the Southern Philippines. The western force captured Tarakan in Northern Borneo on 12 January while the eastern force captured Menado, in the Northern Celebes on 13 January. The next phase, however, was of considerable significance to the defense of Darwin: the capture of Balikpapan by the western force and, more importantly, the capture of Kendari in the southern Celebes by the eastern force.[35] (See Map 3)

Kendari contained the "best airfield in the NEI" which had been constructed in 1940.[36] Not only was East Java now within range of Japanese heavy bombers but also Darwin. Indeed, this airfield was used to launch part of the force used on the raid on 19 February.

The day Japanese troops landed at Kendari, aircraft from the carriers Soryu and Hiryu, in their first mission since the attack on Wake Island, bombed Ambon, the next objective for the Japanese eastern force.[37] Troops were landed on 31 January and by 3 February all resistance to the Japanese had ceased. On 5 February, the Japanese began to base aircraft here as well.

The significance of the Japanese occupation of Kendari and Ambon and the use of carrier-based aircraft should not have escaped the attention of the Darwin garrison. Kendari, already described as the best airfield in the NEI, was capable of accepting all forms of military aircraft. Located some 850 miles from Darwin, any aircraft using this airfield would require a range of at least 1,700 miles. Two aircraft, which had been widely used in the Pacific and Chinese theater, had sufficient range: the allied designated Betty and Nell. A third aircraft, the Helen, which had recently been deployed and made its debut by attacking Darwin, may not have been known to allied intelligence staffs.

The Mitsubishi-built Betty, officially designated by the Japanese as a Type 1 land-based attacker (G4M1), entered service in April 1941, initially to replace the slower Nell. According to "Aireview," it had a maximum range of 2,600 miles without bombs and a range of 2,300 miles with a complete bomb load.[38] This aircraft's first mission had been an attack on Chungking and Chengtu in southeast China in May 1941. Subsequently, it operated extensively in the Pacific, including the initial raid on Clark and Nichols airfields in Luzon and the battles off Malaya. Therefore, this aircraft's performance should have been well known to the allies.

The older and slightly shorter range (1,680 miles) Nell (Japanese designation Type 96 land-based attacker-G3M1-3) was also within range of Darwin but its normal payload would have to be reduced from 2,200 lbs.[39] This aircraft had been deployed in China since 1937 and attracted worldwide attention when it crossed the East China Sea in stormy weather to raid the Chinese mainland in August of that year. Nells also demonstrated their long endurance and reliability in the battle off Malaya in which the Prince of Wales and Repulse were sunk.[40]

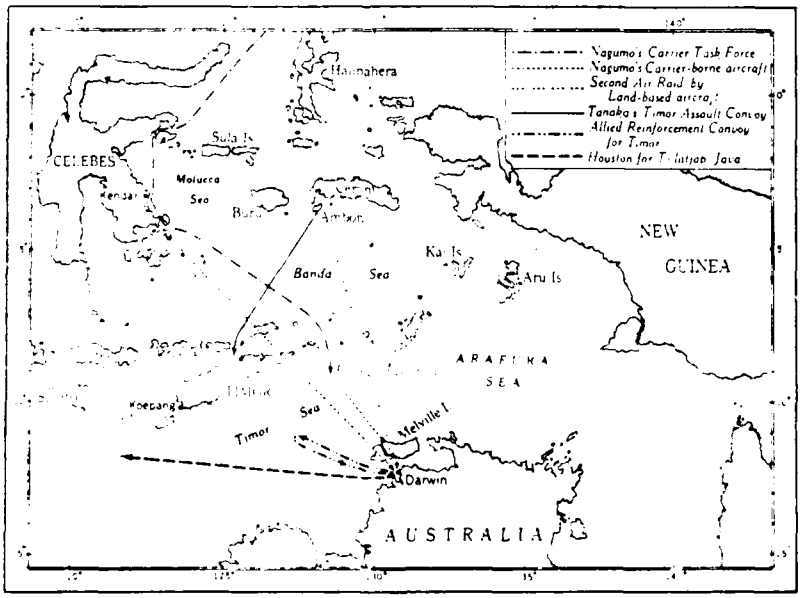
A third aircraft, the Type 100 heavy bomber (Ki-49), allied designation Helen, had recently replaced the Type 97 heavy bomber (Sally) which had a low speed and a short range. The Helen made its debut in its attack on Darwin and therefore its characteristics were probably not well known to the allies.[41] This aircraft most likely flew from Ambon as its range probably was just short of Kendari.[42] Nevertheless, aircraft of this type may have been able to reduce their bomb load to increase their range. Ambon, which was captured by the Japanese on 3 February and where aircraft were deployed on 5 February,[43] was 200 miles closer than Kendari. All three aircraft types, therefore, were within range of Darwin.

From the foregoing analysis, which should have been available to staffs in Darwin, particularly RAAF intelligence staffs, the port was certainly within range of Japanese aircraft which had a proven capacity for conducting long range bombing attacks as evidenced by operations in China, the Philippines, Malaya, Rabaul and the NEI.

Carrier-borne aircraft ranges were more limited. Two aircraft, which were used extensively in the Pearl Harbor attack (the torpedo bomber Kate and the dive bomber Val) had ranges of 1,220 and 960 miles respectively.[44] As these aircraft tended to operate together, the lesser distance is more realistic. Furthermore, if the Japanese expected enemy fighters, then carrier-based fighters (in this case the Zero) would need to accompany the bombers, thus further reducing the range. If 30 minutes is allowed for aerial combat, the Zero had a range of about 1,000 miles.[45] This distance, of course, would need to be halved to allow the fighters to return to their carriers. A shorter range still, however, would be preferable to allow for navigation adjustments, target identification, anti-aircraft fire avoidance and so on. It should also have been clear to the defenders that the Japanese

would anticipate fighter opposition. Japanese reconnaissance aircraft and submarines deployed to observe the harbor entrance should have identified aircraft transmitting to Java. Therefore, if the Japanese followed their previous custom, fighters would accompany carrier-borne bombers.

As it was, the carriers launched their aircraft, according to Lockwood who interviewed the air attack commander, Commander Fuchida, after the war, from a point near 9 degrees south latitude 129 degrees east latitude, or 220 miles northwest of Darwin.[46] (See Map 4) Furthermore, as evidenced by their operation order, the Japanese were expecting fighter opposition.[47] But was there any evidence that the carrier group could close rapidly to within striking distance of Darwin? Could allied staffs reasonably have been expected to deduce this event?



Map 4: Allied and Japanese Ship and Air Movements

The answer to these questions center on the location of the Japanese carriers immediately prior to the attack on Darwin. Their speed, range, launching ability and tactical handling as well as their aircraft performance were well known to the allies, either as the result of technical intelligence or through the analysis of recent operations.[48] The critical issue, therefore, was their location.[49] For instance, given the number and type of information sources available, were the allies able to detect or deduce the presence of four Japanese carriers at Staring Bay in the Celebes, where they concentrated prior to starting their southward move towards Darwin, or the subsequent passage of these ships through the Banda Sea? And if the answer to this question is positive, could Darwin have been deduced as the likely target?

ENDNOTES

1. D. M. Horner, High Command: Australia and Allied Strategy 1939-1945 (Canberra: Australian War Memorial, 1982), p. 1.

2. Only the Australian General Staff consistently pointed out the inadequacy of Australia's reliance on the Singapore-based policy, particularly should Britain be involved in a war in Europe at the same time. Ibid., pp. 1-14.

3. E. G. Keogh, South West Pacific 1941-45 (Melbourne: Greyflower, 1965), p. 5.

4. Speech by the Minister for Defense on Foreign Relations dated 23 March 1936. AAA CRS A5954 Item 1020, p. 6.

5. Minutes of Defence Committee Meeting held on 16 August 1938, A2031, Volume 3, Item 33.

6. Horner, p. 54.

7. Advisory War Council 119, 5 February 1941, AAA CRS A2682, Vol. 1.

8. Secretary of State for Dominian Affairs Cable Z38 dated 7 February 1941, AAA CRS A816, item 19/304/426.

9. Horner, p. 55.

10. Combined Far Eastern Appreciation of Australian Chiefs of Staff, February 1941, AAA CRS A2671, item 64/1941.

11. Combined Operational Intelligence Centre (COIC) Weekly Summary for week ending 21 July 1941, Australian War Memorial (AWM) 423/11/2.

12. COIC Weekly Intelligence Summaries, June to December 1941, AWM 423/11/2.

13. Paul Hasluck, The Government and the People 1942-1945 (Canberra: National Library of Australia, 1970), p. 12.

14. Defence of Australia and Adjacent Areas - Appreciation by the Australian Chiefs of Staff, December 1941, AAA CRS A2671, item 14/301/227.

15. Dudley McCarthy, South-West Pacific Area - First Year Kokoda to Wau (Canberra: Australian War Memorial, 1959), p. 11.

16. Quoted in Horner, p. 142.

17. Advisory War Council Meeting Minutes 631 (6 January 1942), 667 (12 January 1942), 680 (20 January 1942) and 713 (26 January 1942), AAA CRS A5954 Vol. 4. Churchill's rationale for excluding Darwin was that "General Wavell's command area is limited to the fighting zone where active operations are now proceeding. Hence forward, it does not include Australia, New Zealand and communications between the United States and Australia, or indeed, any other ocean communications." W. S. Churchill, The Second World War, Volume IV, The Hinge of Fate (London: Cassell, 1951), p. 8.

18. Robert Woollcombe, The Campaigns of Wavell 1939-1943 (London: Cassell, 1959), p. 173.

19. Ibid., pp. 176-7.

20. Chiefs of Staff Paper No. 4, 29 January 1942, AAA CRS A2671.

21. Gillson, p. 243.

22. Fleet Admiral Ernest J. King, U.S. Navy at War 1941-1945: Official Reports to the Secretary of the Navy (Washington: United States Navy Department, 1946), p. 9.

23. In the Battle of the Java Sea in late February, the remaining allied naval forces suffered severe losses with only four destroyers, out of a force of five cruisers and nine destroyers, surviving. John Costello, The Pacific War (New York: Rawson, Wade, 1981), pp. 206-10.

24. Hasluck, p. 70.

25. Horner, p. 157.

26. Samuel Milner, United States Army in World War II: The War in the Pacific: Victory in Papua (Washington, D.C.: Office of the Chief of Military History, 1957), p. 8. McCarthy, p. 69.

27. The War with Japan Part 1 (7 December 1941 to August 1942) (New York: Department of Military Art and Engineering, 1948), pp. 98-9.

28. Lockwood, pp. 4-5. Combined Fleet Order No. 1, which was issued before Pearl Harbor on 1 November 1941 stated, inter alia, that Tulgai in the Solomons and Port Moresby were to be occupied to dominate the Coral Sea and Northern Australia "as soon as the war situation permits." Ronald Lewin, Ultra Goes to War (New York: McGraw Hill, 1978), p. 84. Thus, in a general sense, it is possible that Darwin's significance as a support area for allied operations in the NEI had been considered at the same time as Order No. 1 was drafted.

29. Lockwood, p. 5.

30. Ibid.

31. Ibid., p. 6.

32. Quoted in Lockwood, pp. 6-7.

33. Ibid., p. 220. Gillison, p. 224.

34. Ibid.

35. F. C. van Oosten, The Battle of the Java Sea (Annapolis, Maryland: Naval Institute, 1976), pp. 17-19.

36. Ibid., p. 20.

37. James H. Belote and William M., Titians of the Seas: The Development and Operations of Japanese and American Carrier Task Forces During World War II (New York: Harper and Row, 1975), p. 33.

38. Kazuo Baba (ed.), General View of Japanese Military Aircraft in the Pacific War (published for "American" by Kanto-Sha, 1956), pp. 55-7.

39. Aircraft characteristics are quoted from The Japanese Air Forces in World War II (London: Arms and Armour Press, 1979), p. 161. Nell is designated both a land transport aircraft and a land attack aircraft. According to the Technical Air Intelligence Centre (TAIC), Anacosta, D.C., Nell had a cruising speed of 157 mph and an endurance with normal bomb load at this speed of 10.7 hours.

40. Baba, pp. 53-5.

41. Ibid., p. 55.

42. According to TAIC data (Japanese Air Forces in World War II, p. 159), the range of Helen, at cruising speed with a normal bomb and fuel load, was 1,600 miles. Baba (p. 28) limits the range to 1,250 miles. This last figure, however, is suspect as Baba lists the bomb load from 1,650 lb. to 2,200 lb. The lower limit should result in a longer range.

43. van Oosten, p. 21.

44. TAIC data (Japanese Air Forces in World War II), p. 160. Belote, p. 23, lists the range of the Val as 1,000 miles and the Kate, in its role as a fleet scout, as 1,250 miles. This latter figure is presumably for the aircraft without its 550-pound bomb.

45. Baba, pp. 38-9, limits the range to 470 miles. The TAIC almost doubles this range while Belote, p. 23, lists the range at better than 1,200 miles, or twice that of contemporary U.S. fighters. Assuming the worst case, 1,200 miles will be used.

46. Lockwood, p. 10.

47. Hasluck, p. 70.

48. Herman Gill, Royal Australian Navy 1939-1942 (Canberra: Australian War Memorial, 1957), pp. 466-70.

49. In the jargon of the intelligence community, this is known as the intelligence problem or requirement, and its articulation focuses collection and analysis efforts.

CHAPTER III

IGNORED WARNINGS: PRELUDE TO THE ATTACK

The Timor Convoy

Before analyzing the sources of information available, a number of incidents occurred immediately prior to the attack which should have alerted the Darwin garrison. On 15 February, an allied convoy of four U.S. Army transports, carrying the equivalent of two battalions to reinforce Koepang's garrison in Western Timor, an important staging point for U.S. fighter aircraft, attempted to reinforce Java from Darwin.[1] The convoy was escorted by the United States cruiser Houston, the United States destroyer Peary and the Australian sloops Swan and Warrego.[2]

About mid-day on 16 February, a four-engined Japanese seaplane, possibly a Kwaishi 97 from Kendari, was sighted shadowing the convoy.[3] The convoy commander requested air cover from Darwin and a single P-40 arrived after the seaplane had made a halfhearted bombing attack on the ships.[4] The next day, also near midday, the convoy was attacked by at least 36 aircraft, most of which were presumed to have flown from Kendari. One source, however, reported that two waves of aircraft, one of 27 land-based heavy bombers and the other of 44 aircraft, "possibly from a Japanese carrier," had attacked the convoy.[5] If this last report had been correct, then it would have been significant, as it represented the first mention of Japanese carrier aircraft operating over the Timor Sea. While the convoy or an intermediate headquarters made this assessment, the U.S. Pacific Fleet did not take this analysis seriously as it was not reported in the daily intelligence summary. Furthermore, no Japanese carrier aircraft were within range as the carriers which attacked Darwin were close to Mindanao, having left Palau on 15 February.[6] The convoy then returned to Darwin after the ABDA Command

assessed that its security, particularly against air attack, could not be guaranteed. (See Map 4) ABDA Command was conscious not only of the threat from land-based aircraft but from the carrier group and also Japanese warships which were rumored to be lying in waiting near Timor.[7]

The convoy's return to Darwin did not escape notice by the townspeople and obviously confirmed earlier assessments that Darwin was vulnerable to air attack from land-based aircraft and brought additional significance to recent Japanese air reconnaissance over the town. Indeed, the Administrator, Mr. C. L. A. Abbott, is reported to have said, "The return of the convoy confirmed my opinion that it wouldn't be long before Darwin's turn came."[8] No mention, however, is made of a threat from Japanese carrier aircraft.

To add to the significance of the convoy's experience, the Houston and Peary left Darwin for Java on the evening of 18 February. As the ships cleared the minefields protecting Darwin harbor, the Peary's sonar contacted a Japanese submarine. The Houston continued while Peary searched for several hours and, after dropping depth charges with undetermined results, returned to Darwin to refuel.[9]

The Flying Boat Incident

The most contentious sighting may not have been reported at all. Lockwood writes that a Catelina flying boat, en route to Darwin, was attacked by Japanese aircraft and may have radioed a warning before being shot down.[10] A more detailed account is provided by Winslow who describes the incident involving a U.S. Navy flying boat which departed Darwin at 0800 hours on 19 February to reconnoiter Ambon, some 600 miles to the north. At about 0920 hours, some 140 miles north of Darwin, the flying boat descended to examine an unidentified merchant ship. While so doing, it was attacked by up

to nine Japanese aircraft and shot down. Winslow claims the flying boat was unable to warn Darwin as its radio was destroyed in the initial attack.[11]

After the Catelina crew had evacuated their sinking aircraft, however, the ship they had been observing, picked them up. This ship, the Florence Dee with an all-Philippino crew, was under charter to the United States Navy to transport munitions and other supplies from Australia to the beleagured garrison in Corrigidor. Clearly the ship had witnessed the Japanese air attack, but there is no evidence of Darwin receiving notice of Japanese aircraft some 30 minutes before the attack on Darwin itself. It is possible, of course, that the ship was not equipped or had a malfunctioning radio. This appears unlikely, however, as shortly after picking up the flying boat crew, the Florence Dee intercepted an SOS from the Don Isidor, some 30 miles north, which was also under attack by Japanese aircraft.[12] Nor is it clear whether the Don Isidor was attacked before or after the raid had started on Darwin. What is certain, however, is that this ship did have a radio.

The Timor Report

The third event is exclusively recorded in Lockwood's account and reinforces the Houston convoy incident with regard to a significant increase in Japanese air activity in the Timor area.[13] Lockwood reports that the Australian consul in Dili in East Timor warned the RAAF Command in Darwin of a major build-up in Japanese air activity, at least twenty-four hours before the raid on Darwin. This message, sent in code, stated that on 16 or 17 February, two flights of Japanese aircraft, comprising 40 and 27 aircraft, had flown over Baucau (80 miles east of Dili) from the north, then gone east along the coast for 20 minutes, then returned over Baucau before heading north and seaward. This information had been reported to the Australian consul, David

Ross, by the Portuguese administrator of the area, Lieutenant Pires, who was subsequently executed by the Japanese.

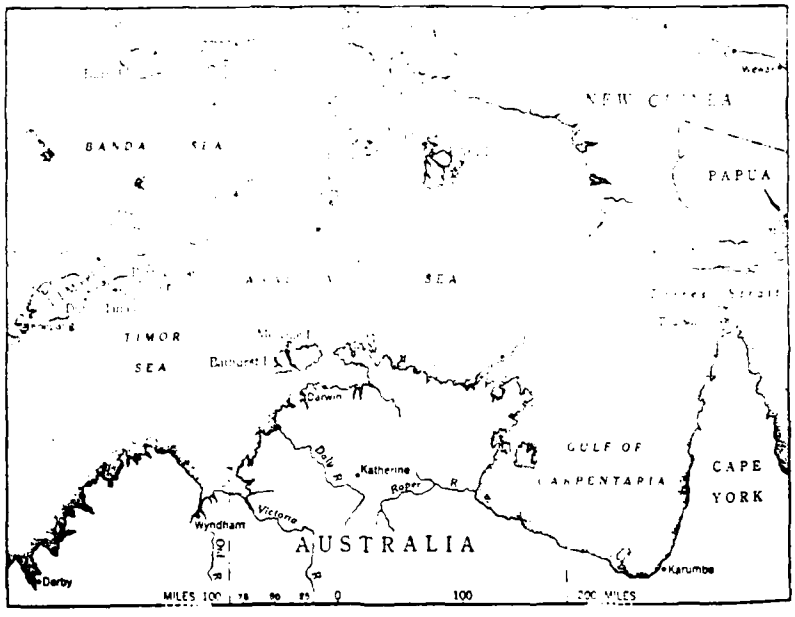
Ross had daily contact with the Department of Civilian Aviation in Darwin through a Portuguese station in Dili. The evening he sent the message regarding the two Japanese flights. He speculated, "somewhat naively" he later states, that he suspected the presence of an aircraft carrier in the Banda Sea. The RAAF obviously received this information (the RAAF was aware and made use of the Ross-Civil Air link) because early in 19 February Ross received a signal from Darwin asking him to specify the type of aircraft, whether monoplane or biplane, and ending with the question querying Ross' conclusion about a carrier in the Banda Sea. Ross could not reply because shortly after the RAAF radio in Darwin was destroyed.

On repatriation to Australia more than a year later, Ross asked Group Captain Scherger, the senior RAAF officer present in Darwin during the raid, why he had not acted on his report. Scherger replied that he had never seen the message.[14]

The Coastwatcher's Report

On the day of the raid, at least three sightings of Japanese aircraft were reported to various authorities in Darwin. While these warnings would have provided as much as 45 minutes' notice, none resulted in a general alarm.

The earliest warning was received by Lieutenant Commander J. C. B. McManus, the senior intelligence officer at Navy Headquarters in Darwin. McManus had earlier established a coastwatching service with observers located at various points west of the Gulf of Carpentaria. (See Map 5) One of these outposts on the northern point of Melville Island, some 50 miles north of the mission on Bathurst Island, which also transmitted a warning, reported a large



Map 5: Northern Approaches to Darwin

From: McCarthy, South-West Pacific Area First Year, p. 612.

number of aircraft.[15] Possibly because of communications problems no identity or direction was given.

McManus received this information at about 0915 hours from a local naval signals station. He had no doubt that the aircraft were Japanese as the coastwatcher did not report friendly aircraft. McManus then telephoned the RAAF intelligence officer on Area Combined Headquarters who told him that the aircraft were probably USAAF P40s returning from Java. McManus did not accept this interpretation; his coastwatcher would not report friendly aircraft and Melville Island was too far east for aircraft returning from Java. Nevertheless, he was overruled and about 30 minutes of warning was lost.[16]

The Mission Report

Approximately 15 minutes after the message from Melville Island, all work stopped at the Catholic Mission on Bathurst Island, some 50 miles northeast of Darwin. Although isolated and reliant on information from ship visits and radio broadcast, the implication of Japan's southern advance towards Australia was not lost on the priests and lay missionaries. The location of Bathurst, and its larger neighbor Melville, was such that any Japanese invasion of Darwin would make the occupation of these islands a likely preliminary operation. Thus, when Father McGrath saw more aircraft than he had ever seen before, flying in formation towards Darwin, he immediately grasped the significance of his observation. He ordered the evacuation of his mission.[17]

He then tuned the mission's transceiver to an emergency frequency which was monitored at all times by the Amalgamated Wireless coastal radio station in Darwin. McGrath is reported to have transmitted: "I have an urgent message. An unusually large air formation bearing down on us from the northwest. Identity suspect. Visibility not clear." McGrath was asked to "stand-by" but could not do so as his mission was then strafed and he was forced to take cover. When he returned to the radio, he found the channel to Darwin jammed.[18]

Meanwhile, the message, which was officially received at 0935 hours by Amalgamated Wireless was passed to the RAAF duty officer at RAAF Base Darwin at 0937 hours. The CO of the base was then summoned to the operations room and, on being told that Area Combined Headquarters had also received it, declined to take any action.[19]

Reports from Army Units

Army units located north of Darwin also reported unusual air activity on three occasions. At 0926 hours, a major reported that he had seen a P40 crash into the sea near Nightcliff, seven miles north of Darwin. The Official War History records that the reply by the RAAF duty officer was, "If this is a raid, we know nothing about it."[20] At 0950 hours the same officer reported an aerial "dogfight" off Nightcliff. At almost the same time, a detachment from a machine-gun regiment, manning an emplacement about 10 miles north of Darwin, reported Japanese aircraft. When queried by his brigade headquarters, the commander described the markings on the aircraft. Brigade headquarters then went through a similar process with the Combined Area Headquarters just as the bombs began to fall.[21]

Thus, despite the possible warnings from the flying boat and the Florence Dee, sightings by the coastwatcher, the Catholic mission and the army units north of Darwin, no effective warning was transmitted to the town and its garrison. (See Tables 1 and 2.) While the warnings were tactical in nature and occurred shortly before the attack, they could have provided the garrison and the town with at least 30 minutes' notice. The absence of any reaction by the Area Combined Headquarters or the senior RAAF headquarters, despite several warnings which supported each other in time and place, clearly indicates an attitude of mind which did not accept an air attack as a likely Japanese course of action.

SPECIFIC WARNINGS AND MAJOR INCIDENTS PRIOR TO 19 FEBRUARY

Date/Time	Activity	Resulting Action/Deduction
1 January	Japanese submarine at Darwin Harbor entrance.	
20 January	Two U.S. destroyers attacked 50 miles northwest of Darwin.	
21 January	Assessment of Japanese attack on Rabaul by Australian Combined Operations and Intelligence Centre (COIC).	Carrier based "Kate" torpedo-bombers used.
22 January	Attack by allied ships on three to four submarines.	One later confirmed destroyed.
4 February	Unidentified aircraft over Darwin for 35 minutes at 22,000 feet.	
14 February	U.S. ships attacked by flying boat 60 miles northwest of Darwin.	Japanese thought to be regularly patrolling shipping routes north and west of Darwin (COIC).
15 February	Timor bound convoy attacked 150 miles west of Darwin.	
16 February	Unidentified aircraft over Darwin.	Pursued by allied fighter.
	Japanese mines wash ashore.	Laid by submarine.
18 February	COIC comment on 15 February incident.	"Evidence of excellent enemy reconnaissance service and speed in mounting attacks."
18 February	Australian consul in Timor advises increased Japanese air activity.	RAAF Darwin queries report.

TABLE 1

SPECIFIC INCIDENTS 19 FEBRUARY

Time	Activity	Action
0915 Hrs.	Coastwatcher on Melville Island reports numerous aircraft.	Aircraft evaluated as USAAF P40s.
0925 Hrs. (Approx)	Catelina flying boat shot down near Darwin.	Message not received in Darwin.
0926 Hrs.	Army unit north of Darwin reports P40 crash into sea.	RAAF Darwin does not link crash to a raid.
0935 Hrs.	Mission on Bathurst Island reports "large number" unidentified aircraft.	Received at RAAF Darwin and passed to Area Combined Headquarters. No action before raid starts.
0950 Hrs.	Army unit reports aerial "dogfight" off coast.	No reaction before fall of bombs.
0950 Hrs. (Approx)	Machine gun outpost reports Japanese aircraft.	Report reaches Area Combined Headquarters as raid starts.

TABLE 2

ENDNOTES

1. Units included the 2/4th Pioneer Battalion, the II/148th U.S. Field Artillery Battalion and an Australian anti-tank troop. Dudley McCarthy, South-West Pacific Area - First Year Kokoda to War (Canberra: Australian War Memorial, 1959), p. 69.

2. In official Australian histories, the ships are referred to as sloops while most U.S. sources identify them as corvettes.

3. Most sources refer to one seaplane or flying boat. In W. Karig and W. Kelley, Battle Report: Pearl Harbor to Coral Sea (New York: Farrar and Rinehart, 1944), p. 205, however, two flying boats are cited.

4. Most sources claim an attack by a flying boat. Karig and Kelley, however, claim the flying boats shadowed the convoy for about an hour before flying off.

5. The number and type of aircraft used varies with sources: official Australian sources (McCarthy, p. 69) and Douglas Lockwood, Australia's Pearl Harbour (Melbourne: Cassell, 1946), p. 47 list 35 bombers and nine flying boats; W. E. Winslow, The Fleet the Gods Forgot: The U.S. Asiatic Fleet in World War II (Annapolis, MD: Naval Institute Press, 1962), p. 18, cites 36 twin-engined land based bombers; Samuel Eliot Morison, History of United States Naval Operations in World War II, Volume III, The Rising Sun in the Pacific 1931-April 1942 (Boston: Little, Brown, 1950), p. 315, lists 36 land-based and 10 sea-planes; and Karig and Kelley, p. 205, citing official U.S. Navy sources, state two waves of aircraft (27 land-based and 44 possible carrier-based) struck the convoy.

6. James H. Belote and William M., Titians of the Seas: The Development and Operations of Japanese and American Carrier Task Forces During World War II (New York: Harper and Row, 1975), p. 48.

7. Morison, p. 315. Of the sources quoted in footnote 5, only Karig and Kelley, p. 205, allude to the possibility of Japanese surface units lying in ambush off Timor.

8. Lockwood, p. 47.

9. Winslow, p. 93.

10. Lockwood, p. 26.

11. Winslow, pp. 184-7.

12. Ibid., p. 187.

13. Lockwood, pp. 27-30.

14. Ibid., p. 30.

15. Ibid., p. 24.

16. Ibid.

17. Ibid., pp. 22-3.

18. Ibid., p. 23. "Commission of Enquiry," pp. 9-10.

19. It is significant that although the RAAF Base Commander declined to alert his unit, presumably because he considered Area Combined Headquarters responsible for making the assessment of an impending attack and issuing the necessary warning, he was still prepared to state in evidence to the Commission that "he did not consider the planes flying over Bathurst Island to be American planes returning." "Commission of Enquiry," p. 10.

20. Douglas Gillson, Royal Australian Air Force 1939-1942 (Canberra: Australian War Memorial, 1962), p. 431.

21. Lockwood, pp. 26-7.

CHAPTER IV

ASSESSMENT OF INFORMATION

Sources of Information

The sources of information available to the allies were probably limited to communications intelligence (signals intelligence, traffic analysis and direction finding), surveillance and reconnaissance (including photography) by allied air, surface and submarine forces, land-based sources, such as coastwatchers, and covert means, including espionage.

Signals Intelligence

With regard to signals intelligence, it is possible that one of three Japanese cipher systems might have revealed Japanese intentions to attack Darwin.[1] The first, the Japanese diplomatic machine cipher, code-named PURPLE by the United States and whose intercepts were disseminated under a process known as Operation MAGIC, was penetrated by U.S.-army crypto analysts on 25 September 1940. The second cipher system related to two consular codes which the United States could read without much difficulty but which had a low priority, in relation to PURPLE, because of a shortage of Japanese-speaking analysts.[2]

While the recovery of these systems was a remarkable cryptanalytical achievement, most of the information related to Japanese diplomatic reporting on foreign countries and contained little of strategic or operational value.[3] Nor were Japanese diplomats privy to such information and the entire Japanese Foreign Ministry was a victim of compartmentalization.[4]

The most important source of Japanese defense intelligence had been the "Flag Officers Cryptographic System" which carried the most sensitive information and was considered the most secure.[5] Nevertheless, the United

States had been able to acquire considerable information from this system from about 1926 to November 1940 by which time a new version appeared which would resist all attempts to break it.[6]

The most likely cipher, had it been capable of being exploited, was the main Japanese fleet cipher known as JN-25. This operational code, in which about half Japan's naval messages were transmitted, came into effect on 1 June 1940, and its numerical keys were changed on 1 December 1940, 1 June 1941 and on 4 December 1941.[7] But how effective the allies were in reading this cipher is open to question. Rusbridger, for instance, believes the United States Navy mastered all the keys with only minor delays.[8] Others, however, are not so positive.

In April 1941, the United States Navy intelligence communications unit, Station Cast at Cavite in the Philippines, was tasked by Washington to break JN-25. Layton believes this was a major error as Station Hypo in Hawaii had the Navy's most experienced analysts. As a result, the JN-25 system was never "to yield more than a partial readability" before Pearl Harbor.[9] Other sources claim that only 10 to 15 percent of any message was readable.[10]

A concerted effort was finally mounted on 17 December 1941 when Hypo in Hawaii and OP-0-G in Washington joined Cavite in attempting to capture the code. The three units cooperated closely with each other and with the British unit in Singapore.[11]

Some success occurred almost immediately; a Japanese unit inadvertently repeated part of a coded message in plain text and, by late January, some sentences were becoming readable.[12] In the third week of January, for instance, Hypo concluded that Rabaul would shortly be occupied and that Carrier Division 2 would support operations off New Guinea.[13] Despite these successes, however, the intercept and decryption of Japanese operational

traffic was still at a primitive stage. Nor did the problem end with the decryption and translation; information was usually received in an incomplete, fragmental manner, and there were frequent and major disagreements as to the significance and meaning of the information. Indeed, it was not until late May 1942 that the timing of future operations could be determined.[14] Nor were Japanese army cryptographic systems any help; none were broken until 1943.[15]

Even if the contents of intercepted communications could not be read by cryptoanalysis, they were still able to yield important information as a result of traffic analysis. This involved studying the frequency, length of message, transmission routine and even the idiosyncrasy of the operator as well as identifying the originator and receiver of the message. Together with the process of radio direction finding, by which the transmitter's location could be identified, important clues regarding the general nature, content and precedence of the message could be determined. As a result, force structure, unit locations, subordination and grouping could be determined. To be effective, however, such activities required strategically located listening posts and skilled analysts. Furthermore, in 1941, the lack of an adequate and rapid communications link between Oahu, Midway, Samoa and Dutch Harbor "plagued the operation of the mid-Pacific radio direction-finding network."[16] Nor had these difficulties resolved themselves by the time of the attack on Darwin.

Nor were Americans only involved in reading Japanese naval codes. In addition to the United States Navy in Washington and Stations Hypo and Cast, British and Dutch and, to a lesser extent, Australian sections worked with Japanese codes.[17] The British signals intelligence unit, the Far East Combined Bureau (FECB), based in Singapore with a detachment in Hong Kong,

reportedly was able in September 1939 "to keep track of his (Japan's) main naval movements."[18] This suggests an equal, if not better capability than the United States Navy. Likewise, the Dutch role is not entirely clear. Located in Bandoeng on Java, the Dutch began reading Japanese consular codes in 1932 and penetrated the naval ciphers about the same time. Unfortunately, little is known of their work as records were destroyed in early 1942.[19]

Despite the optimistic assessments of Professor Hinsley and his team, and recently published writings which support British and Dutch warnings of a possible attack on Pearl Harbor,[20] there is considerable evidence that allied cooperation before December 1941 was limited. All sides were wary of revealing the extent of their sensitive sources not only to protect them,[21] but also out of respect for each other's neutrality.[22] Kahn also claims that the United States was wary of British and Dutch signals intelligence assessments because they might be slanted in an attempt to draw Washington into the war.[23] Finally, Levite believes that Britain and Holland also had difficulty in penetrating Japanese naval codes.[24]

But what of Australian developments in this area? Before World War II, Australia had few sources of her own and relied largely on Britain for what was termed "special intelligence."[25] Even after the outbreak of war, the development of Australia's intelligence services was "slow and hesitant."[26] Despite some work by the Army and the establishment of a Sydney University based group which concentrated on Japanese codes, it was not until late 1940 that a systematic attempt was made to create a section responsible for obtaining information by direction-finding, traffic analysis and cryptanalysis. Commander Nave, who had considerable experience with FECB, incorporated the Sydney University group and began to study Japanese traffic in the mandated territories.[27] Radio intercept stations were also

established at Darwin, Melbourne and Canberra and information exchanged with FECB and the Dutch intelligence organization at Bandoeng.

While the Australian establishment did succeed in breaking the Australia-based Japanese mission's cipher, the size and capability of the unit was such that it could do little more than "supplement the work of the FECB and the GCCS at Bletchley Park in England."[28] Furthermore, by early 1942, allied intelligence capability in the Southwest Pacific was considerably reduced. In January 1942, for instance, FECB left Singapore and the Dutch "sigint" service was shortly to destroy all its records. Likewise, Cast began to withdraw from Corregidor with 17 men leaving on 5 February and a further 30 on 11 March.[29] Indeed, the situation in Australia shortly after Darwin's raid was such that MacArthur requested a trained staff be sent to Australia to supplement the "few that I have brought from the Philippines."[30]

In terms of communications intelligence, therefore, the period between the bombing of Pearl Harbor and the attack on Darwin was one of considerable change and reorganization. While the Japanese naval code was attacked in an unprecedented manner, in terms of resources allocated this task, it would be some months before it was sufficiently readable to enable analysts to determine Japanese intentions with confidence. Meanwhile, Japanese operations against Singapore, the NEI and the Philippines had severely reduced allied ability in this area. Therefore, despite the considerable increase in Japanese radio communications, because of the widespread nature of their operations and their inability to transmit sensitive information quickly by other than radio, the volume of signals intelligence prior to the Darwin attack was probably less than it had been shortly before the raid on Pearl Harbor. An examination of the United States Pacific Fleet Intelligence Summaries confirms this assessment.

These summaries were compiled from all available intelligence sources. They were usually the synthesis of many individual reports and seldom the result of a single message. Where a unit or ship was identified, it might be the result of traffic analysis of several radio intercepts or the result of two or more direction finding "fixes" from different intercept stations.

A review of the United States Pacific Fleet's daily intelligence summaries in the 10 days prior to the Darwin raid reflects both the primitive nature of direction finding and traffic analysis and the inability of U.S. analysts to decipher the Japanese naval code.[31]

On 13 February, reflecting little change from the previous weeks' reporting, Carrier Division 1 (Kaga and Akagi) was noted in the Palau area while Carrier Division 2 (Hiryo and Soryu) was in the Celebes-Palau area. No communications were reported from either division on 14 February although Carrier Division 2 was still supporting First Air Attack Force which was known to be in the Celebes area. During this period, all ships were in Palau.[32]

The 15 February summary is even less specific. While many "leads" were reported in carrier traffic, none were conclusive. Instead, both carrier divisions were estimated to be in the "Philippine-Indies" area. Nevertheless, in an almost prophetic assessment, Lieutenant Commander E. T. Layton, the senior Fleet Intelligence Officer, made a general comment to the effect that the focus of Japanese naval activity appeared to be shifting from the New Britain area to the Banda and Java Seas as Tokyo pursued its next objective, the capture of the NEI chain. The War Plans section confirmed this assessment and forecast "strong air attacks on the eastern portion of Java and on the island objectives from Java to Timor." On this day, both carrier divisions left Palau for the southern Philippines.[33]

On 16 February, both carrier divisions were estimated near the Celebes. Carrier Division 1 was estimated in the Menado Area and Carrier Division 2 in the Menado-Kendari area. The Ryujo, a light carrier, was also reported in the Kendari area although the Fleet Intelligence Duty Officer was hard-pressed to explain the presence of this fifth carrier.

On 17 February, the locations once again become less precise with both carrier divisions reported in the Indies-Palau area. The Ryujo, however, was located in the Malay area while Koryu, or a designator thought to be that carrier, was considered to be in the Celebes area. Next day, the Koryu's designation was in question as this carrier was part of Carrier Division 5, located in Japanese home waters. Both Carrier Divisions 1 and 2, however, were reported "closely associated with air activity in the South Celebes area."

Allowing for the broad area descriptions (the Indies and the Philippines), Carrier Divisions 1 and 2 were reported most frequently within a triangle linking Kendari (in the Celebes), Davao (in the southern Philippines) and Palau. This is a large area with the sides of the triangle measuring 800 miles (Kendari and Davao), 700 miles (Davao to Palau) and 1,400 miles (Palau to Kendari). Assuming a ship speed of 30 knots, the steaming times from Davao and Palau to Kendari would be about 23 and 40 hours respectively. (See Map 1) Therefore, the locations in the summaries are not an accurate indication if intentions are to be linked to the positions of the Carrier Divisions. Even when the locations were reasonably accurate, such as on 16 and 18 February, analysts had no way of knowing this, and locations were quite likely to be less precise and in a different area on the following day.

The assessment by Layton did provide an indication of a shift in Japanese intentions. Nevertheless, this conclusion simply confirmed a recent trend

whereby the Japanese were quite clearly closing in on Java. On 15 February, for instance, Palembang in Sumatra was occupied and Bandjermasin, in southern Borneo, was captured on the next day. At no time, however, was there any reference, either as the result of intercept or analysis of communications intelligence, that Darwin was a target. Whether this intelligence failure should, or could, have been avoided will be discussed later.

Air and Naval Reconnaissance

The second most reliable means of detecting the carrier divisions was either by air or naval reconnaissance. Air reconnaissance would probably be restricted to flying boat which alone had sufficient range and endurance while naval reconnaissance, at least at this stage of the war, was limited to submarine observation.

The allies employed both means. The Japanese bases at Palau, Rabaul and Ambon were frequently reconnoitered from the air and Kendari, on at least one occasion, received similar treatment.[34] In addition to the weather, which left many areas cloud-covered at this time of the year, the main problem was scarce resources and a large area to cover. Reconnaissance targets, therefore, had to be carefully selected. Unless Kendari had featured regularly as a major base, and here the lack of precise information from communications intelligence was a factor, it is unlikely that the concentration area from which the carrier divisions would start their dash towards Darwin, would have been regularly and systematically reconnoitered or placed under submarine observation. As a result, there is no record of the carrier groups being detected in their passage of the Banda and Timor Seas.

A further source, which featured largely in the islands off New Guinea and in the Solomon Islands, was the coastwatching service. Organized by the Royal Australian Navy, and largely comprising local Europeans who had remained

behind the Japanese advance, this source provided valuable information on Japanese air and naval movement. A similar service was not provided by the Dutch, and Kendari was not placed under observation.[35]

Clandestine Sources

Espionage was nonexistent. There were no highly placed agents who had access to the decisions of the higher commando.[36] The United States had deliberately refrained from "engaging in this type of activity due to moral, political and budgetary considerations" and, at the time of Pearl Harbor, had only "a nucleus of what might be called a secret service" which confined its activities to "tying in with the British Secret Service in the Far East."[37]

Nor had the British Secret Service apparently retained any worthwhile agent networks in Japan. The one-man occupants of the two Secret Intelligence service stations in Yokahama and Shanghai were captured and interned at the outbreak of the war and the joint intelligence unit, Combined Intelligence Far East, was forced to evacuate before Singapore surrendered.[38]

Overt Sources

With regard to overt sources, the Japanese quickly imposed measures to control the mass media and foreign correspondents. No allied diplomatic source remained, no neutral embassy appears to have provided any significant information and travellers to Japan were obviously severely restricted.[39]

Conclusion

All sources were severely restricted because of Japanese operations and the speed with which they had advanced through Southeast Asia and the Southwest Pacific. A change in their naval code and the requirement by the

allies to evacuate their signals intelligence units in Singapore, the Philippines and the NEI probably removed the only source capable of providing the allies with an unambiguous statement of Japanese intentions. All other collection means were curtailed by limited resource and Japanese operational security measures.

ENDNOTES

1. Other codes undoubtedly were involved. Station Hypo, the U.S. Navy communications intelligence unit on Oahu, for instance, spent many fruitless months attempting to break the Japanese Admirals' code which defied all attempts. Likewise there were a number of administrative ciphers which gave little operational information. Rear Admiral Edwin T. Layton, And I Was There (New York: Morrow, 1985), pp. 52, 77, 413-14.

2. James Rusbridger, "Winds of War: Mythology and Fact About Enigma and Pearl Harbor," Encounter, January 1986, pp. 8-9. Ladislas Farago, The Broken Seal (New York, Bantam, 1968), p. 55.

3. Ariel Levite, Intelligence and Strategic Surprises (Cornell University PhD Thesis: University Microfilms International, 1983), pp. 76-7. David Kahn, The Code Breakers (New York: MacMillan, 1967), p. 7.

4. Roberta Wohlstetter, Pearl Harbor (Stanford: Stanford University Press, 1962), pp. 201-3.

5. Levite, p. 40.

6. Kahn, p. 7. Farago, p. 137.

7. Ibid, pp. 562-3.

8. Rushbridger, p. 9.

9. Layton, p. 94.

10. Ibid., pp. 534, 538. Captains Rochefort, Dyer and Wright, considered the most successful and experienced analysts in the Pacific, believe the figure 10 to 15 percent to be accurate, and this assessment is supported during Admiral Hewitt's enquiry in May 1945 (Ibid., pp. 534, 547-8).

11. Kahn, p. 564.

12. Layton, pp. 339-40.

13. Ibid., p. 359. W. J. Holmes, Double-Edged Secrets: U.S. Naval Intelligence Operations in the Pacific during World War II (Annapolis, MD: Naval Institute Press, 1979), pp. 64-5.

14. Levite, pp. 148-9.

15. Farago, p. 162.

16. Layton, p. 93.

17. Rushbridger, p. 9.

18. Francis A. Hinsley, British Intelligence in the Second World War, Vol. I (Cambridge, England: Cambridge University Press, 1979), p. 53.

19. Rushbridger, pp. 9-11.

20. Ibid., pp. 633-34.

21. Levite, p. 84.

22. Hinsley, pp. 311-12.

23. Kahn, p. 496.

24. Levite, p. 85.

25. Special intelligence was the euphemism for signals intelligence. D. M. Horner, High Command: Australia and Allied Strategy 1939-1945 (Canberra: Australian War Memorial, 1982), p. 225.

26. Ibid., p. 224.

27. Ibid., pp. 224-26.

28. Ibid., p. 225.

29. Layton, p. 379.

30. Horner, p. 227.

31. See United States Pacific Fleet Intelligence Summaries for the period 9 to 19 February. U.S. National Archives SRMN-012, Part 2, pp. 233-91.

32. James H. Belote and William M., Titians of the Seas: The Development and Operations of Japanese and American Carrier Task Forces During World War II (New York: Harper and Row, 1975), p. 48.

33. Ibid.

34. Frequent mention is made of aerial reconnaissance of Japanese naval units and bases. S. W. Roskill, The War at Sea: The Period of Balance, Vol. II (London: Her Majesty's Stationery Office, 1956), p. 11. F. C. van Oosten, The Battle of the Java Sea (Annapolis, MD: Naval Institute, 1976), pp. 17, 22, 27.

35. A major source of such activities is Eric A. Feldt, The Coastwatchers (Melbourne: Oxford University Press, 1946). A similar system was considered for the NEI but "the Japanese invasion was too swift and too successful for much to be achieved." Patrick Howarth, Undercover: The Men and Women of the Special Operations Executive (London: Routledge and Kegan Paul, 1980), p. 214.

36. Levite, p. 73.

37. Jeffrey Dorowart, Conflict of Duty: The U.S. Navy's Intelligence Dilemma, 1919-1945 (Annapolis, MD: Naval Institute Press, 1983), p. 785.

38. The Combined Intelligence Far East unit, first formed in Hong Kong in 1938, contained elements of the Naval Intelligence Division, MI5 and MI6. Nigel West, MI6: British Secret Intelligence Service Operations 1909-1945 (New York: Random, 1983), p. 140.

39. Levite, pp. 70-3.

CHAPTER V

SURPRISE: AN ASSESSMENT

Scope of Problem

That the defenders of Darwin, the ABDA Command which had operational responsibility for the defense of the area and the Australian government were surprised by the timing and scale of Japanese attack on 19 February is without doubt. Whether an attack was expected at all and why the defenders were surprised is not so clear. Was there sufficient information to alert policymakers to the danger of such an attack? And if the answer is positive, why did the Japanese succeed? These are the critical questions.

There are probably two vital elements regarding the first question of adequate information: did the allies know of the Japanese decision to attack or could they be expected to deduce such an intention from available information. Quite clearly, from the preceding analysis, no intelligence source, covert or overt, provided a clearly articulated statement that Darwin was to be attacked in force on 19 February. Did the absence of unambiguous information, however, excuse the allies of an intelligence failure?

Theoretically, the answer to this question is no. Part of the intelligence process, which involves the collection and analysis of information and the dissemination of the resulting intelligence, is to identify those critical requirements needed to accomplish a mission. Once these requirements are identified, then information must be collected to satisfy them. This involves determining the best collection asset and then tasking and deploying this asset.[1]

In the case of Darwin, the critical intelligence requirement could be posed as a question: will the Japanese attack or occupy Darwin; if so, how and when?

The first part of the question, in fairness to intelligence staffs, could only have been answered positively if the decision taken by the High Command, or a copy of the subsequent directive or operation order, had been acquired. As already discussed, this did not happen. Nor is this surprising given the state of the allied collection assets and the security of the Japanese.

Indeed, the lack of a clearly articulated statement of enemy intentions is likely to be the normal situation in war. Seldom will such precise information as an operation order or a directive be available and then only rarely in time for it to be acted upon. While the decryption of German and Japanese signals traffic gave the allies considerable advance warning of enemy intentions, this situation may not occur again. What is more likely is that various sources will report activities associated with the preparation of an operation (reconnaissance, movement of forces, prepositioning of supplies, changes in the grouping of units, visits by senior commander) which, if pieced together, may point to a future operation. These separate but selected pieces of information are known as indicators. The question to be asked, therefore, is whether there were sufficient indicators to identify Darwin as a target.

Before determining the answer to this question, it is also reasonable to assume that in the absence of a positive assessment (that is an unqualified yes or no), that it is probably prudent to consider that Darwin is a target. Therefore, Darwin's defenders should have been prepared for an attack only if there was positive information to indicate otherwise. Clearly, with the constant build-up of defenses in the previous two years, Australian policymakers were not yet prepared to consider Darwin safe from attack.

The "how" and "when" part of the question assumes that an attack has not been ruled out and provides some indication of how Darwin might be defended. For instance if the attack is to be by air only, the resources required to

protect Darwin may be limited to early warning and anti-aircraft and fighter units. Alternatively, if the "how" indicates that an air attack will be followed by an amphibious assault, both ground and naval forces will need to be included in the order of battle. The "when" question gives the amount of time required to prepare the defenses and the degree of notice that the defenders have.

In determining how the Japanese might attack Darwin, it may not have been possible to identify a single, clear course of action. Instead, several options might be determined. The attack may, for instance, involve a fully fledged amphibious assault or it may be limited to an air and naval attack or simply an air attack. What should now occur is an analysis of how each of these attacks should take place. In the case of the air attack, aircraft might deploy either from carriers or from bases located certain distances from Darwin. Thus, this process starts to identify what information is required and provides a basis for tasking and deploying collection assets. Therefore, to simply state that the allies did not have sufficient information is not to excuse them of an intelligence failure. The question now becomes: did the allies have sufficient information on which to base an assessment and, if not, did they take the necessary steps to acquire such information.

Absence of Unambiguous Information

As previously stated, the allies did not receive any clear, unambiguous statement that Darwin was to be attacked on 19 February. But was such information available? The answer is yes. Indeed the decision to attack Darwin had been discussed at length by the Combined Fleet Staffs and the General Staffs of the Army and Navy. Approval in principle had been given shortly after Pearl Harbor but the issue was raised in general on 20 January by the Commander of Carrier Division 2 who was concerned about the role Darwin

might play in interfering with the Japanese capture of the NEI. Combined Fleet Staff wished to seize the area by amphibious assault but this was vetoed by the Army and Navy General Staffs. Furthermore, there was considerable debate about whether Darwin or Colombo should be attacked first.[2]

Once the decision to attack Darwin by air was made, the order was radioed to the Carrier Division.[3] It is probable, however, that the Carrier Division staffs were well aware of the proposal and may already have started detailed planning. With so much planning and discussion, why did the allies not receive some indication of the Japanese attack?

As already stated, the sources of information available to the allies were severely limited at this time. Had allied signals intelligence reached the same level of proficiency that existed in mid-May, for instance, then Order 9, the directive to attack Darwin, would probably have been intercepted and deciphered. Nor was direction finding sufficiently accurate to locate, with any degree of precision, the carrier divisions. No covert means were available to acquire copies of the minutes of discussion nor the operational directives and insufficient combat had taken place to enable captured documents or prisoners to be acquired and exploited. Indeed, only the reconnaissance or surveillance of the carrier divisions was likely to provide an indication of Japanese intentions. And even had the carrier division locations been reported, until they entered the Timor Sea, it is likely that their presence would have been associated with impending operations in Java or Timor. In summary, the allies received no warning from their strategic sources that Darwin would be attacked. How, therefore, did they react in the absence of positive information? Did their assessment of Japanese intentions lead them to the conclusion that Darwin might be attacked? This question

might be answered from either the strategic viewpoint, that is at national level, or from the perspective of Darwin's garrison.

As already described the Japanese threat had been a concern in defense circles for many years.[4] It was not until the late 1930's, however, that any positive steps were taken to improve Darwin's defenses. War Cabinet, Advisory War Council and Defence Committee minutes from 1938 to 1942 frequently cite defense measures ranging from an increase in troop strength to developing harbor defenses to withdrawing the bulk of the civil population. Nevertheless, it was not until almost the surrender of Singapore that alarm for the defense of Darwin was expressed.[5] Even then, a raid of the magnitude of 19 February was not anticipated in any Australian defense assessment. Why was this so, given the deterioration of the allied position in the ABDA Command and in the Southern Pacific?

Failure at National Level

There are probably a number of reasons why greater concern was not expressed over Darwin's security. Firstly, Australian policymakers appeared to assume that Darwin could not be threatened substantially until both Singapore and the Philippines had fallen and much of the NEI was in Japanese hands.[6] This assessment remained in vogue until at least mid-February by which time the fall of Singapore was obvious and policymakers were distracted by other events. Indeed, the entire Australian decisionmaking process, political, military and bureaucratic, was frequently distracted at this time by other crises: the pace of Japanese operations; the worsening situation regarding Singapore; deteriorating relations with London over Britain's inability to deal Japan and a reluctance to return Australian troops; and a shift in focus, at least in terms of strategic advice, towards Washington. Furthermore, greater concern was expressed for the defense of eastern

Australia where the population and industrial base was located than for isolated Darwin.[7] Thus, when the situation in Darwin called for the clearest assessments and the most attention, Australian officials were in the worst position to respond.

Finally, Australian officials rarely saw Darwin as a major target; much of the defense development related to its role as a forward base and was considered a deterrent against low level raids rather than a defense against substantial attack.[8]

The most serious threat to Australia was thought to be through the islands to the north and northeast and not towards Darwin. This assessment had been made as early as 11 December 1941 by the Australian Chiefs of Staff.[9] It was anticipated that before a major assault, Rabaul, Port Moresby and New Caledonia would be occupied. Subsequent appreciations reinforced this assessment and events generally followed this conclusion; Rabaul was attacked on 23 January and Port Moresby was considered a likely objective in mid-March.[10]

In terms of the approaches to the central coast of northern Australia, Australian policymakers thus saw Java as the main Japanese objective and considered Japanese activities in this area and in the vicinity of Darwin to be linked to the capture of this island. Therefore, Darwin was accorded a low priority with most attention by national authorities being focused on the approaches to Port Moresby and Java.[11]

Nevertheless, regardless of the distraction of Australia's policymakers and the relatively low priority accorded Darwin, it was a serious mistake to assume that the port would not be attacked before the fall of the NEI. An analysis of Japanese operations should have shown the concern that Japanese planners had for their flanks and for interference by allied air and naval

forces located distant from, but within range of, current objectives. Pearl Harbor, of course, was the most notable example. But other cases confirm this policy: both Clark Field and Singapore were attacked well ahead of ground operations; Borneo was seized to prevent interference with the capture of Malaya; Davao in the Southern Philippines was attacked in preparation for operations in the Central Philippines; Ambon was captured in order to eliminate a threat to the capture of the Celebes; and Rabaul was occupied, partly to eliminate a threat to Truk. Nor were the Japanese hesitant in using long range land based aircraft in conjunction with carrier-borne aircraft: Wake, the Philippines, Tarawa, Ambon, Rabaul and Kaviang were examples. To assume, therefore, that Darwin could escape an attack by Japanese aircraft before Java was captured was to ignore previous Japanese operational doctrine. Indeed, Darwin should have anticipated an attack, the magnitude of which would seek to eliminate it as a support base.

Failure by the Darwin Garrison

Not only did senior Australian officials, the ABDA Command and their intelligence staffs fail to make this assessment, but the Darwin garrison, which was much closer to the area of operations, failed to appreciate the threat as well. And yet, as already discussed, Japanese activity and interest in the Darwin area had been evident for several weeks. Being distracted by other issues or relegating the priority of Darwin's defense cannot be used as an excuse by the defenders. Why, therefore, did Darwin fail to appreciate the likely threat?

Firstly, there was no assessment from either national sources or the ABDA Command, which employed a much wider range of collection assets than was available to Darwin, to suggest that an attack was imminent. While local intelligence staffs might point to a more serious threat, and there is no

indication that this was the case, it was comforting to the defenders to know that their senior headquarters held little fear for their safety. Nevertheless, they did anticipate some low level harassment and did plan and exercise accordingly.[12] But this was not to anticipate the scale of attack which occurred on 19 February. Part of the reason for this failure may be found in the Forward of Lockwood's book, written by Group Captain Frederick Scherger who was administering command of the RAAF's Northwest Area Command on 19 February:

> The air attack was unexpected for two reasons. The first was that we did not believe the meagre forces in Darwin could be assessed by the Japanese as being a danger to them. The second was that we had no reliable warning of the Japanese Carrier Task Force in the area.[13]

Herein lies part of the problem; the allies simply could not believe the Japanese would bother with Darwin to the extent they did. From an allied perspective, and particularly from that of Darwin's residents, the base posed little if any threat; it had no organic offensive air capability (such aircraft merely transitted between Java and Southern Australia); its air defenses were scarce and certainly less than those required to defend a major target; no powerful fleet operated from the harbor; and its wharf and ship handling capacity was limited. In comparison to other bases (Singapore, Batavia, Surabaia and even Port Moresby), Darwin was second-rate. Nor was it thought to be strategically located in relation to Japanese objectives as Ambon, Kendari and Rabaul were.

Japanese reconnaissance aircraft, after a few initial scares which resulted in air raid alerts, were taken for granted and dismissed as routine surveillance of the base. Thus, an attitude developed which suggested that if a threat did occur, it would do so sometime in the future. Meanwhile, the Japanese would be fully occupied securing the NEI and would have neither the

resources nor the need to attack Darwin. This attitude of mind became so pronounced that even when faced with information which contradicted this assessment, it was reasoned away so as not to challenge the basic theory.

Here, too, Darwin's defenders failed to analyze the pattern of previous activity and the concern the Japanese had for the security of their operations. It is difficult to determine why this was the case; certainly there was ample information. Perhaps the failure to draw correct deductions may be partly explained by recent research which concludes that decisionmaking differs markedly from the rational processes normally associated with such activity.

Pathological Failure

Some psychologists suggest that it is impossible to carry out the procedures associated with rational decisionmaking. Certainly, there is growing evidence that analysts process and interpret information according to a set of mental rules that bear little relationship to those of formal logic. Robert Abelson refers to this as "psychologic." Numerous experiments conclude that people try to keep their beliefs, feelings, actions and mental processes mutually consistent.[14] Psychologists have theorized that this phenomenon is an intuitively satisfying way of organizing thought processes because it simplifies interpretation, retention and the recall of information. If this is so, there are obvious adverse implications for decisionmaking because it suggests a systematic bias in favor of information consistent with what has already been assimilated.[15]

The most convincing analyst in this area is Robert Jervis who has studied the implications of these issues on foreign policy. He contends that policymakers have beliefs which shape the way in which they respond to external stimuli. Thus policymakers are more responsive to information that

supports their existing beliefs than they are to information that challenges them. When confronted with critical information, they tend to misunderstand it, twist its meaning, explain it away or simply ignore it.[16] By this process all but the most unambiguous evidence will be interpreted to confirm the wisdom of established assessments.[17]

Whereas Jervis stresses the ways in which cognitive processes distort decisionmaking,[18] another school of psychology emphasizes the importance of motivation as a source of perceptual distortion. Irving Janis and Leon Mann are representative of this group which assumes that decisionmakers and analysts are emotional beings and not rational calculators, that they are beset by doubts and uncertainties and are reluctant to make irrevocable choices. When a decisionmaker is faced with contradictory information, he is likely to respond by procrastinating, rationalizing or denying his responsibility for a decision. These responses are termed "defensive avoidance."[19] Thus for Jarvis, analysts see what they expect to see; for Janis and Mann, what they want to see.

Jarvis also believes that resistance to critical information increases in proportion to a policymaker's confidence in his selected course of action, the extent of his commitment to it and the ambiguity of information he receives about it. For Janis and Mann, insensitivity to warnings is the hallmark of defensive avoidance. When confronted with disturbing information, an analyst will alter its implications through a process of wishful thinking.

To a certain extent, the foregoing may explain why the duty staff at Area Combined Headquarters and RAAF Darwin Headquarters did not accept at face value the reports of approaching Japanese aircraft. Certainly they had a right to be concerned over possible U.S. aircraft activity, and they were conscious that another false alarm would have an adverse effect on the town's

population. But the direction of the aircraft, their numbers, the jamming of the mission radio and the previous day's attack on the convoy should have alerted them. Nor is it clear whether they responded to the shooting down of the flying boat or the attacks on the Florence Dee or the Don Isidor. Even the report by the Australian consul in Timor regarding the possibility of carriers was discounted. While it is easy, with hindsight, to condemn the garrison commanders and their staffs, it is difficult to understand how the increase in Japanese activity and the events immediately prior to the attack did not trigger some response. The answer may well be found in the psychological causes for misperception.

The involvement of Japanese carriers also came as a surprise to Darwin's defenders. Once again, analysts failed to consider the pattern of Japanese operations and the role played by the carriers. Carrier aircraft had been used to attack Rabaul and Ambon in recent weeks and there were occasional sightings and observations of carriers between the Celebes and Ambon. Had analysts computed the speed and ranges of carriers and their aircraft, it would have been obvious how far carriers could move in a given time, say 24 or 48 hours, to be within launching range of Darwin. Coupled with an analysis of the likely approaches a carrier group would take, the commanders of the Darwin garrison could then establish a surveillance pattern for ships or aircraft to provide early warning. This analysis would also have raised considerably the level of concern over the Japanese ability to move quickly over long distances. There is no evidence that such an assessment did take place or that surveillance assets were deployed.

ENDNOTES

1. This is the standard training manual description of the cyclic, four-part process which develops intelligence from information.

2. Douglas Lockwood, Australia's Pearl Harbor (Melbourne: Cassell, 1946), pp. 5-6. Paul S. Dull, A Battle History of the Imperial Japanese Navy 1941-1945 (Annapolis, MD: Naval Institute Press, 1978), p. 54.

3. Lockwood, p. 6.

4. As early as 1920, a committee to consider Australia's defense concluded that Japan was the only nation likely to attack Australia in the foreseeable future. E. G. Keogh, South West Pacific 1941-45 (Melbourne: Greyflower, 1965), Chapter 2.

5. Chiefs of Staff Paper No. 4, 29 January 1942, AAA CRSA 2671.

6. Minutes of Advisory War Council Meeting, 28 November 1941. AAA CRS A5954. Report of Singapore Defence Conference, 1940 - Review by Chiefs of Staff. AAA CRS 5954.

7. As early as 1936, the Minister of Defence stated that the priority for coastal defence was Sydney, Newcastle, Fremantle and Brisbane. Speech delivered by Minister for Defence, Archdale Parkhill, on 11 May 1936. (Melbourne, Government Printer.) The controversy over the "Brisbane Line" which considered the defense of Eastern Australia and the abandonment of the north is typical of this issue.

8. Minutes of Defence Committee Meeting, 7 May 1940 and 28 September 1940, both AAA CRS A5954. Minutes of War Cabinet Meeting, 24 September 1940. AAA CRS 5954.

9. The appreciation stated that "the possibility of a direct move on Australia via the islands to the north and northeast must now be considered." Defence fo Australia and Adjacent Areas-Appreciated by the Australian Chiefs of Staff, December 1941, AAA CRS A2671, item 14/301/222.

10. Probable Immediate Japanese Moves in the Proposed New Anzac Area, 5 March 1942, AAA CRS A2684, item 905.

11. The Australian appreciations correctly gauged Japanese intentions, at least in the early stages. On 2 February, for instance, Japanese Imperial General Headquarters ordered the capture of Lae and Salamana on the northern New Guinea coast and the subsequent capture of Port Moresby. David M. Harner, High Command: Australia and Allied Strategy 1939-1945 (Canberra: Australian War Memorial, 1982), p. 181.

12. Lockwood, Chapter 7.

13. Ibid., p. xi. Later Air Chief Marshal Sir Frederick Scherger, Chairman Chiefs of Staff Committee.

14. Robert P. Abelson, et. al., Theories of Cognitive Consistency: A Sourcebook (Chicago: Rand McNally, 1968), pp. 112-39.

15. Richard N. Lebow, Between Peace and War: The Nature of International Crises (London: John Hopkins, 1981), pp. 102-103.

16. Robert Jervis, Perception and Misperception in International Politics (Princeton, NJ: Princeton University Press, 1959).

17. A major deduction in almost all strategic surprise is that fragmentary indications of alarm that did reach decisionmakers were dismissed because they contradicted strategic estimates or assumptions. Richard K. Betts, "Analysis, War, and Decision: Why Intelligence Failures are Inevitable," World Politics, (31 October 1978), p. 63.

18. Jervis, pp. 117-25, 260-70.

19. Irving L. Janis and Leon Mann, Decisionmaking: A Psychological Analysis of Conflict, Choice and Commitment (New York: The Free Press, 1977), pp. 56-60.

CHAPTER VI

CONCLUSION

All levels of the Australian political, defense and intelligence community, the staffs of the ABDA Command and the Pacific Command in Hawaii, as well as the local Darwin garrison were surprised by the Japanese raid on 19 February 1942. While some assessments considered Darwin as a possible target, they generally assumed that such an attack would only occur after Java, the main Japanese objective in the NEI, had been captured. This faulty assessment contributed to two further failures which compounded the problem of preventing a surprise attack: indications of increased Japanese interest and activity on the approaches to Darwin were related to the anticipated attack on Java, and the Darwin garrison failed to deploy sufficient surveillance assets to detect the approach of the Japanese carrier divisions.

For several weeks before the attack, Japanese air and naval activity had increased steadily in the vicinity of Darwin. Much of this was correctly interpreted as reconnaissance or surveillance related and subsequent attacks on allied shipping and aircraft en route from Darwin to the NEI appeared to confirm these assessments. No one, however, concluded that the information gathered by the Japanese would eventually be used to plan and conduct a major raid on Darwin. But how much of this failure can be attributed to knowledge in hindsight? Is it unreasonable, for instance, to have expected the various allie intelligence staffs to have interpreted the information other than the way they did? Were they in a position, for instance, to not only identify Japanese intentions but to be able to determine Japanese miscalculations based on faulty information and analysis? After all, the Japanese High Command did not issue the order to attack Darwin until 31 January 1942 and probably misjudged its importance as an allied base.

Allied intelligence staffs throughout the Pacific theater were undoubtedly hard pressed with satisfying immediate intelligence requirements for political and operational purposes: the ABDA Command was heavily involved with events leading to the fall of Singapore and the assault on the NEI, U.S. staffs in Hawaii were clearly concerned with events in the south and central Pacific and Australian authorities were concerned with monitoring the developing threat to northeast Australia through New Guinea and adjacent islands. Therefore, there was little effort to analyze, except in a tactical sense, the well established pattern of Japanese activities throughout the Pacific and to project this analysis to future developments.

As a result, intelligence analysts failed to appreciate the Japanese concern for the security of their flanks and the efforts they were prepared to expend to ensure that relatively insignificant targets were neutralized, particularly by air power, to remove any interference to the capture of a major objective. In this light, Darwin clearly assumes a more significant role in relation to the capture of Java as it was the only base, outside the NEI, from which allied ships and aircraft could influence operations against the island.

Because commanders supported the intelligence assessments that Darwin was unlikely to be attacked, at least before the capture of Java, they failed to ensure that adequate surveillance assets were deployed to detect the approach of Japanese ships and aircraft. While these assets were scarce, higher priority might have been accorded to increasing the number of ships, aircraft and radio monitoring equipment if the likelihood of an attack had been considered higher.

Some excuse has been attributed to the surprise involvement of the four carriers. While allied radio detection and, in particular, decryption

capabilities were at their lowest level in the Pacific war, and the carriers were throught to be in either the Philippines or Palau, Australian authorities were aware that the Japanese aircraft in Kendari and Ambon were within range of Darwin. Nevertheless, the overwhelming assumption that Darwin would not be attacked before Java was captured prevailed.

This concept clearly affected Darwin itself. Despite several warnings immediately prior to the attack, no alert occurred. Even when observers positively identified Japanese aircraft, there was still a reluctance by headquarter staffs to declare an alert as the reports were reasoned-away, mainly on the assumption that the aircraft in question were returning allied fighters.

Unlike Pearl Harbor, it was not a case of too many, or of contradictary, signals. Indeed, the scarcity of information leads perhaps to the conclusion that a more active program to acquire information should have been implemented. Nor did the Japanese attempt any deception measures other than to impose radio silence and advance as rapidly as possible from the assembly area in the Celebes to the launch point. Therefore, the errors of failing to determine the possibility of an attack and to detect the approach of the carriers were the result of a false assumption and a willingness to rationalize all subsequent information to fit this assumption. These mistakes are frequently found in other cases where surprise has occurred, and generally result because priorities for research and analysis are developed in such away as to exclude, or lead to the neglect of, secondary problems which may quickly turn into primary concerns.

Thus the failure in the case of Darwin was essentially one of misperception. While some observers may believe that such failures can be avoided by such measures as perfecting procedures for analysis and increasing

the size of the intelligence establishment, such beliefs are illusory. Intelligenc failures are more often political and psychological than organizational, and the use of intelligence depends as much on the intellect and inclinatons of those who use the product as on the producers themseves. Unfortunately, too, policymakers are more responsive to information that supports their beiefs than they are to information that challenges them. By this process, all but the most unambiguous evidence will be interpreted to confirm the wisdom of the established assessment. The record of surprise since Darwin, both strategic and operational, attests to these conclusions.

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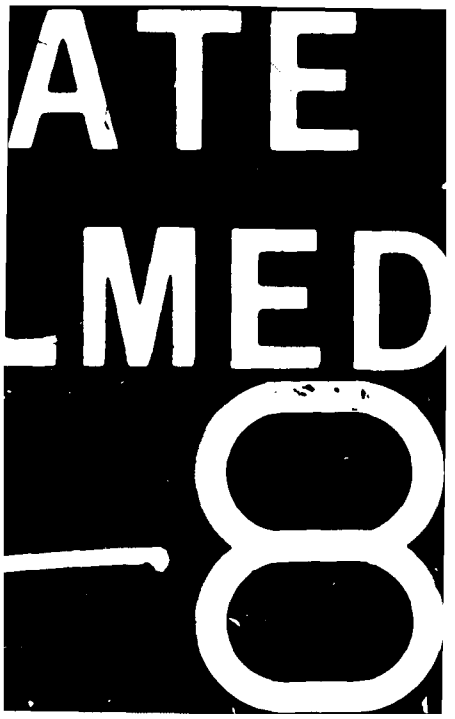
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